



This is a digital copy of a book that was preserved for generations on library shelves before it was carefully scanned by Google as part of a project to make the world's books discoverable online.

It has survived long enough for the copyright to expire and the book to enter the public domain. A public domain book is one that was never subject to copyright or whose legal copyright term has expired. Whether a book is in the public domain may vary country to country. Public domain books are our gateways to the past, representing a wealth of history, culture and knowledge that's often difficult to discover.

Marks, notations and other marginalia present in the original volume will appear in this file - a reminder of this book's long journey from the publisher to a library and finally to you.

Usage guidelines

Google is proud to partner with libraries to digitize public domain materials and make them widely accessible. Public domain books belong to the public and we are merely their custodians. Nevertheless, this work is expensive, so in order to keep providing this resource, we have taken steps to prevent abuse by commercial parties, including placing technical restrictions on automated querying.

We also ask that you:

- + *Make non-commercial use of the files* We designed Google Book Search for use by individuals, and we request that you use these files for personal, non-commercial purposes.
- + *Refrain from automated querying* Do not send automated queries of any sort to Google's system: If you are conducting research on machine translation, optical character recognition or other areas where access to a large amount of text is helpful, please contact us. We encourage the use of public domain materials for these purposes and may be able to help.
- + *Maintain attribution* The Google "watermark" you see on each file is essential for informing people about this project and helping them find additional materials through Google Book Search. Please do not remove it.
- + *Keep it legal* Whatever your use, remember that you are responsible for ensuring that what you are doing is legal. Do not assume that just because we believe a book is in the public domain for users in the United States, that the work is also in the public domain for users in other countries. Whether a book is still in copyright varies from country to country, and we can't offer guidance on whether any specific use of any specific book is allowed. Please do not assume that a book's appearance in Google Book Search means it can be used in any manner anywhere in the world. Copyright infringement liability can be quite severe.

About Google Book Search

Google's mission is to organize the world's information and to make it universally accessible and useful. Google Book Search helps readers discover the world's books while helping authors and publishers reach new audiences. You can search through the full text of this book on the web at <http://books.google.com/>

CONFIDENTIAL
327

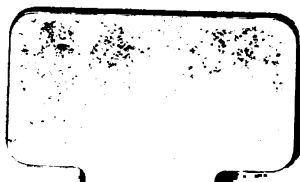
Lyn

RBR

ASHMOLEAN MUSEUM
LIBRARY

PRESENTED BY

Sir Alan Gardiner.





302281811Q

~~107~~

Expt 307..

4/—

—/—



A VISIT
TO THE
SUEZ CANAL.

BY
T. K. LYNCH, F.R.G.S. &c. &c.
AUTHOR OF "AN EXPLORATION IN THE MARSHES OF BABYLONIA."

WITH TEN ILLUSTRATIONS.

DAY AND SON, LIMITED,
Lithographers and Publishers,
GATE STREET, LINCOLN'S INN FIELDS, LONDON.
1866.



8 JUL 1962

TO

G. G. MACPHERSON, Esq.

DIRECTOR OF THE ANGLO-EGYPTIAN BANK,

This little Volume is dedicated by the Author,

IN GRATEFUL RECOLLECTION

OF

VARIOUS ACTS OF KINDNESS WHICH HE RECEIVED

WHEN TRAVELLING THROUGH EGYPT

IN

1864, 1865.

~~107~~

Count 307..

4/ -

X



CONTENTS.

CHAPTER I.

Departure — My Companions — En Voyage—Paris — Mar- seilles — Alexandria — The Menet-el-Bussal — Cotton — Cairo — The Esbequiah — The Slave - market — The Nilo- meter—The Mosque—Statistics	9
--	---

CHAPTER II.

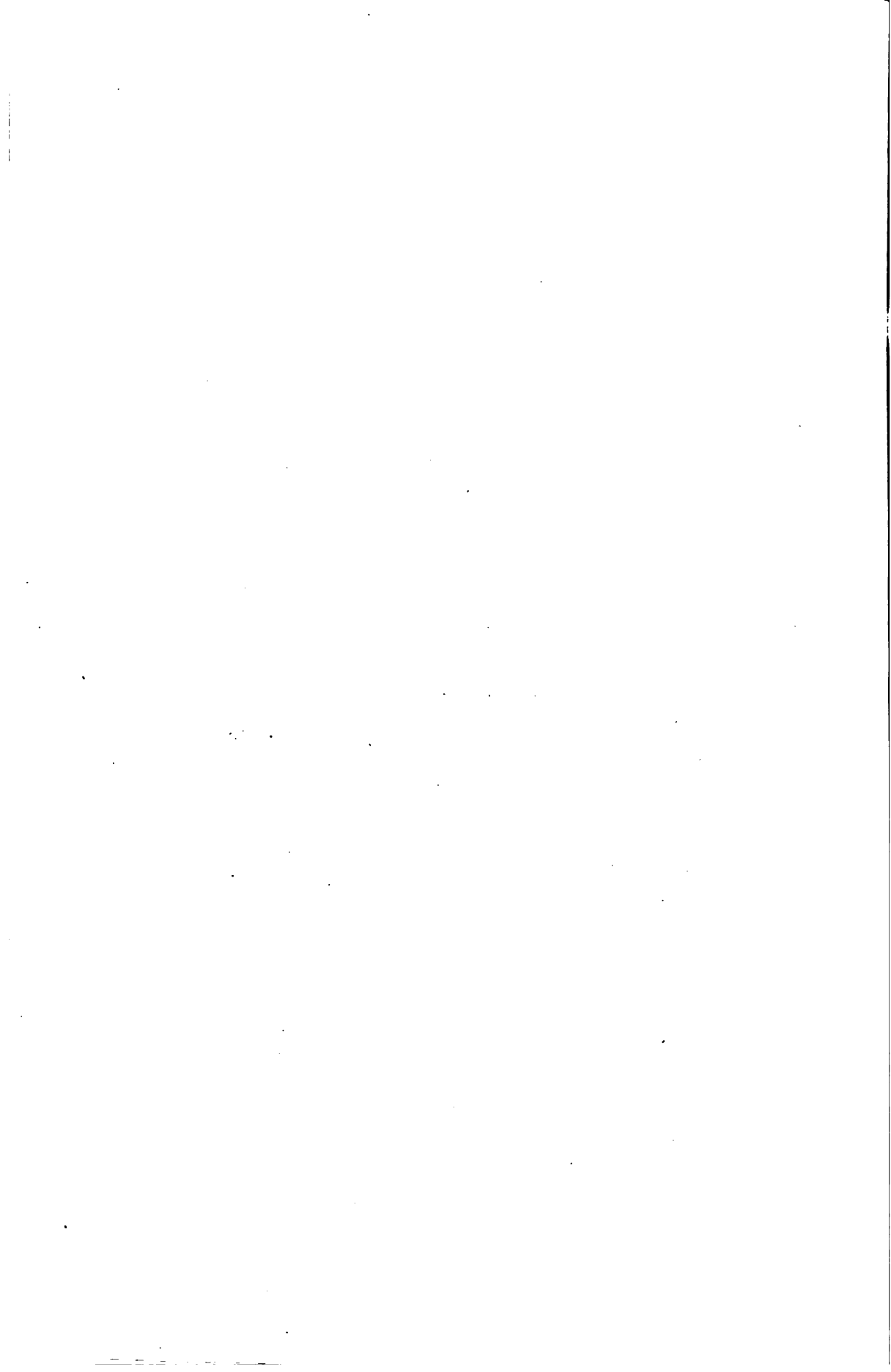
Leave Cairo—Benha—Minet-el-Ghumha—Zagazik—Ancient Cities—Towing Excursion—Ismail Pasha—El Abbas— Route to Tel-el-Kebir—M. Guichard—Gassaseen—Rameses —Lake Ismalia	25
---	----

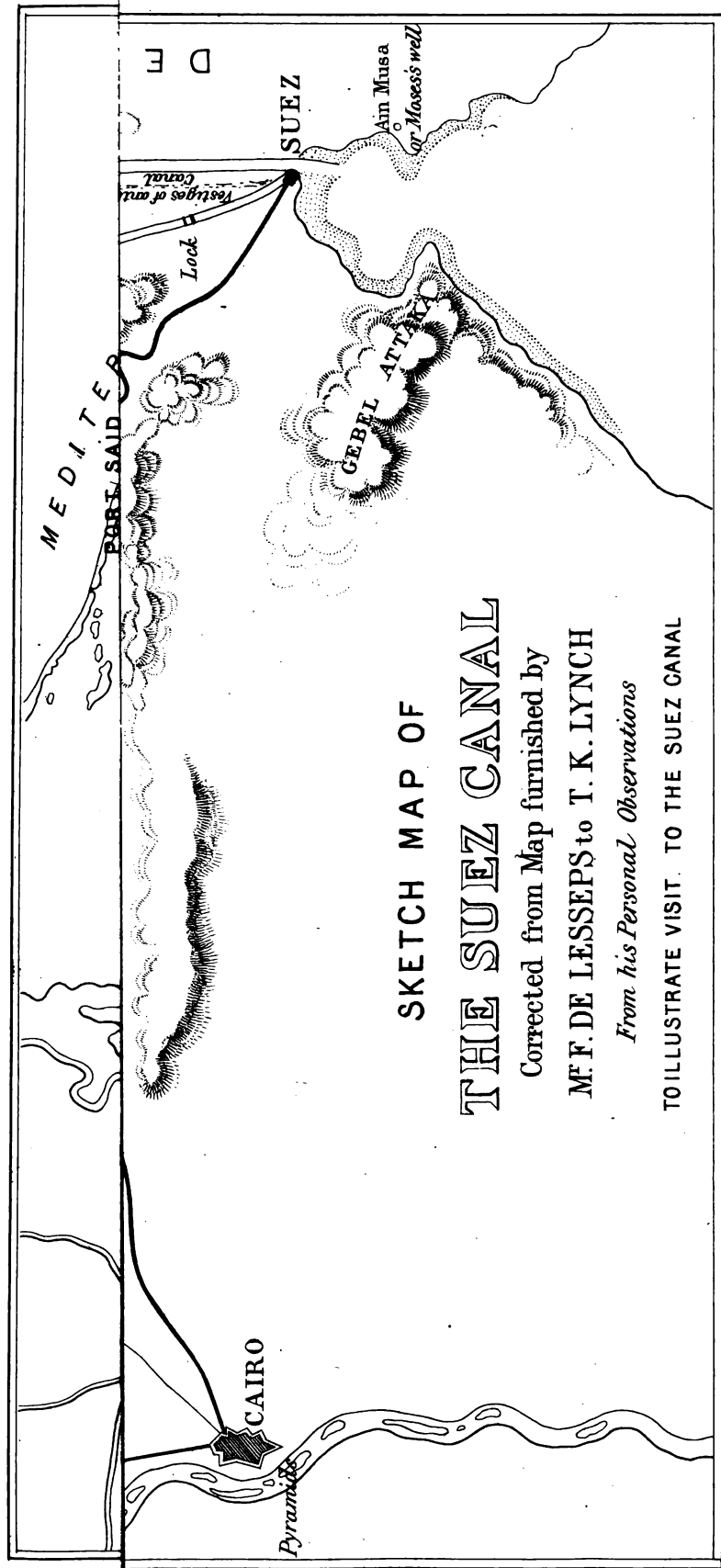
CHAPTER III.

Lake Timsah—Hôtel des Voyageurs—Timsah Harbour—The future City—M. de Lesseps—Interesting Discussion— Departure for Port Saïd—The Maritime Canal—Descrip- tion—El Ferdane—Lake Ballah—Gunterah—The Sheikh and his Arab Mare—Arrival at Port Saïd—Reflections —Statistics—The Climate—Visit to the Hospital—Mr. Ayton—Departure from Port Saïd—"The Field of Zoan"—Half the Canal "done"	36
---	----

CHAPTER IV.

The Canal Works—Historic Recollections—M. Caillet— Sketching—Statistics—The Bitter Lakes—Abu Ghunnum —Mahomedan Doctrine—Gebel Akaba—The Pharaonic Canal—Arrival at Suez—Conclusion	60
--	----





SKETCH MAP OF THE SUEZ CANAL

Corrected from Map furnished by
M^r. F. DE LÉSEPS to T. K. LYNCH

From his Personal Observations

TO ILLUSTRATE VISIT TO THE SUEZ CANAL

A VISIT TO THE SUEZ CANAL.

CHAPTER I.

DEPARTURE — MY COMPANIONS — EN VOYAGE — PARIS — MARSEILLES — ALEX-
ANDRIA — THE MENET-EL-BUSSAL — COTTON — CAIRO — THE ESBEQUIAH —
THE SLAVE-MARKET — THE NILOMETER — THE MOSQUE — STATISTICS.

ON the 5th of October of last year, having made arrangements for spending some time in visiting Egypt, I left 31 Cleveland Square for that purpose. It was a very lovely morning. Summer had appeared once more to say "*Au revoir*" on parting. Even the dingy squares and gloomy streets of London looked cheerful, as I was whirled past them to the Railway Station to Charing Cross—that boon to west-end travellers—where I found all in busy preparation. There stood the train ready to hurry us to our destination—busy porters appearing and disappearing on every side, guiding with wondrous skill heavily-laden trucks of luggage, destined for all quarters of the globe; some for the sunny shores of "*la belle France*," some for the downs and exhilarating promenades of the numerous cities which deck our own coasts, and some for the heart-saddening return to India.

This magnificent station, so rapidly becoming one of the most important emporiums of railway traffic, presents many

interesting subjects of inquiry and observation. But neither time nor railway trains wait ; and now the shrill whistle is heard, the flag waves, the engine puffs, as the tidal train glides gracefully from the station on its route to Folkestone.

My immediate companions were a chatty Frenchman and a taciturn Italian : the former eloquent as to an alleged attempt made to cheat him in the weighing of his luggage, and the adroit manner in which he had baffled "*le perfide Albion*;" the latter, buried in his own thoughts. Mine naturally dwelt upon those whom I had just parted from, but soon became less gloomy, warmed by the sun's brightness, which suggested to me that such was the weather I should probably bear with me to Egypt, instead of the dark, cold, foggy climate of a London November.

A glance every now then over the rich, lovely scenery which England presents at this season of the year, the *Times*, and a chat with my French companion, wiled away the two hours and ten minutes occupied in reaching Folkestone.

The sea looked very boisterous ; only a few vessels to be seen, and those under close-reefed topsails. As we slowly descended down the incline into the Port we ascertained that the steamer of the previous day had not crossed, owing to the gale, and that, consequently, the quay was crowded with passengers eager to embark ; although, as far as the sea was concerned, not under much more favourable auspices.

Having placed my cloaks and a travelling writing-case on a couch below, I put on my muffler and came on deck. The vessel was rolling, even in harbour ; and when we quitted its shelter the discomfort was beyond description, the sea washing clean over the fore part of the ship, so that no passenger could remain there : every bench also having its male and female occupants wrapped in waterproofs, and with drooping, pale faces, and holy resignation, enduring the

drift and spray which every five minutes showered upon them. I seized the corner of the dais on which the helmsman stands, and kept looking over the sea, watching the waves as they tossed the spray into little rainbows on their summits. As each sea struck the steamer she trembled violently, sometimes sinking so deep as almost to force my heart into my mouth. It was no use trying to get the place I had taken possession of, with my things down below, so I lay on the deck as a resting-place. This, however, made matters so much worse, placed as I was so far aft, that I tottered as I best could through dripping crinolines to the deck over the engine-room; mounting which, and holding with a stout heart by the rail, I remained under the shelter of the funnel until we reached the shores of France.

The passport system having been abolished, I was able at once to walk on shore, and with the assistance of the cabin-boy, whom I had enlisted to carry my rather heavy cloaks and despatch-box, and without being subjected to the slightest surveillance of the Custom-house authorities, I jumped into a *voiture*, and found myself traversing the well-known quays of Boulogne to the Chemin de Fer du Nord, which we left at 3.45, arriving at the railway-station in Paris at 8.45. Here we were detained for nearly an hour, while our baggage was arranged along forms, to enable each passenger to claim his own more easily; a system which appears preferable to that adopted in England, where it is flung out of the van, to be claimed by each owner as soon as recognised. The able and quick-sighted, it is true, who sees his, can depart rejoicing, leaving, however, the timid or feeble to struggle through a mass of confusion. After having received much politeness from the officers and some insolent grumbling from greedy porters, I drove to the Grand Hôtel, engaged a room *au troisième*,

had some supper, and after a roam along the Boulevards, with a little admiration of the print-shops, retired to rest.

On the following morning (Oct. 6th) I took breakfast with some dearly-loved relatives residing in the Rue de Rivoli, whose affectionate hearts and sweet simplicity of manner always make me feel happy and at home in this gorgeous French capital. *Ekbâl Ood Dowleh*, a Nawâb of Oude, came to dine with us : he was an old friend of mine in the East, and had just arrived in Paris. He fell into my arms, embraced and kissed me, and finished by even kissing my beard : his delight amounted to a kind of frenzy. I drove him home in the evening, and we chatted away in Arabic—the only language known to us both, as he spoke no European tongue, and I could not converse in Hindustani. I owe to him—when I was travelling in Persia—a debt of gratitude I can never repay.

On the following day, having strolled through Paris with my friends, and joined them in an early dinner, I reached the Lyons railway station in good time to secure a corner in the *coupé* for Marseilles. A Levantine occupied the other corner, and we were congratulating ourselves at being alone when a whole family of old ladies persisted on entering, the most enterprising of them actually shoving the Levantine out of his place ; when he made himself so disagreeable that she thought it better to decamp, particularly when a box, containing a favourite dog, was so disturbed by him that the animal began to squeal, and thus offered him the opportunity of insisting that she should choose her company.

We had scarcely congratulated ourselves on having got rid of this party, when an enormous Frenchman made his appearance at the door. My companion hinted that really an overcrowded *coupé* was intolerable ; but the Frenchman planted his stern on his side of the *coupé*, and commenced such a blowing, hawking, coughing, and spitting (apparently

his natural mode of blowing off steam), that my friend and I looked on ourselves as doomed martyrs. However, he left my side entirely to myself, at which I was greatly obliged ; and his subsequent good-nature—the peculiarity of all fat men—made some amends for the inconvenience he had caused us. He left us at Lyons, and we reached in the morning the richly-cultivated plains of Avignon, and soon were skirting the mountains which encircle the port of Marseilles. We flew along the lake-like shores of the Gulf de Marthe, and passing through a long tunnel, found ourselves running into the station at a very rapid pace. This is, without exception, the best train that leaves Paris. We accomplished the entire distance of 538 miles in sixteen hours, arriving in Marseilles just at twelve o'clock midday, when I drove to the Grand Hôtel du Louvre, and with difficulty secured an apartment on the first floor.

After enjoying a few days' rest at Marseilles, where I experienced much kindness from Monsieur Pastré, a French gentleman of the *ancien régime*, I secured a berth on board the Peninsular and Oriental Company's steam-ship "The Ripon," which left for Alexandria on the 12th of October, and after a prosperous voyage of seven days arrived off that port.

EGYPT, the land of the Pharaohs, is now before us, and so sunk that it appears as if below the level of the sea, particularly after leaving the fine, bold, lofty coasts of Europe and Asia. As we approach land all eyes are vainly trying to discover the minaret, lighthouse, or windmills, which were said to be visible on the horizon to the south. As we neared the shore, which was without tree or verdure, a low building, studded with many domes and minarets, was pointed out as one of the palaces of the Viceroy: it stood on the last rocks of the Libyan desert, beyond the reach of the Nile inundations, on the site of ancient Racotis, and close to the Catacombs. Coasting this shore, and rounding a reef to seaward of us, we entered the harbour of Alexandria. There are no lighthouses to mark the extremity of the above reef, and, therefore, ships at night seldom enter the harbour. Rain fell in torrents, adding to the confusion which arose on board the steamer in landing the Indian passengers. Owing to the kindness of a friend, who had brought a boat off for me, we got our luggage into the craft and made towards shore. On reaching a white-washed wall and a door on the wharf, we entered a low, white building, where a novel scene presented itself: we were at the Custom-House, and were soon surrounded by Egyptian Arabs in white shirts and short linen breeches, which showed their naked arms and legs to great advantage. They issued their orders in a most confused and vociferous manner, and quite took possession of us; and though I warned them off in their own vernacular, I found it best to give in; and, *grace à Dieu!* by aid of a little *baksheesh* we were placed in a very nice Italian

britzska, without the loss of a single article, and our curious attendants, having given the necessary directions to their wild-looking compatriots, who were perched, like dressed monkeys, on the box, started us off with many blessings. We were preceded by a running footman, remarkable for his white turban and loose sleeves, who cleared the way—shouting and pushing the people in all directions. The low and narrow streets were full of muddy pools, in which our vehicle sunk in many places to its axle; the bazaars were filthy, exhibiting the dirtiest fruit, vegetables, and groceries, and presided over by ugly old women and greasy-looking men. I at once recognised that awful perfume of garlic, and assa-foetida, and tobacco, &c., the peculiar aroma of a true Arab bazaar. It would have been difficult to have got through without accident, as the little space was crowded, were it not for our useful forerunner. When these bazaars were built they were never intended for the handsome vehicle in which, to the astonishment of the many-coloured and curiously-costumed natives, the European was seated in safety and at ease.

We soon reached the Grand Place, where stood the Hôtel de l'Europe. The Place itself is a quadrangular space, ornamented with trees and fountains, and surrounded by fine Grecian buildings. One can recognise here nothing African, save the swarthy negroes and their half-caste descendants—wild-looking savages, who, having taken possession of this oasis of the civilised world, squatted about in lazy contentment.

Arriving at the hotel we found the flagged rooms primitively straight, narrow, cold-looking, and lofty: the beds had mosquito curtains drawn all round, which might have ensured a good night's rest, were it not for the African guards, who roared all night long like some gigantic gorillas, walking with outstretched necks from their dark

retreats, their hairy breasts and bare legs standing out in bold relief.

During a short stay in Alexandria I paid the usual visit to Pompey's Pillar and Cleopatra's Needle, and took several interesting walks to the cotton market, called Menet-el-Bussal, or the Onion Wharf. It is situated at one extremity of the Mahmudiah Canal, close to the port, where locks are constructed to keep in the fresh or sweet water of the canal. I was much pleased to find active commerce carried on here in cotton and cotton-seed, and to see the picturesque boats or barges (which did not line, but only claimed as much of the banks as their stems could occupy). Outside, also, barges full of cotton quietly glided along for some place to stick in their noses. Though of the Arab type, they differ from those of the Tigris and Euphrates only in the smallness of mast and greater length of yard; which, in the distance, looks like an immense lofty mast, tapering aft. Arab merchants walked along the low booths, or shops, that lined the wharf, on which was a very good tramway. They carried in blue paper samples of their cotton, and walked into the offices—for I may, with reason, dignify them as such—of any of the brokers whom they thought likely to buy. These people receive often large sums of money from the merchants of Alexandria as an advance on their cotton; and, I was informed, pay $2\frac{1}{2}$ per cent per month, if they have good credit, or 3 and 5 per cent if not. They deliver their cotton in payment at the price of the day when it arrives, and give in as a bonus five rottles in each cantar—about 104 lbs.

An immense fortune could be made by a bank in advancing on cotton, and taking money on deposit; and such is their good faith, that whole villages often combine and discharge the debt of any defaulter in their ranks.

The proud Mussulman, in his patriarchal garb, here ex-

poses sample after sample of his cotton, and quite enjoys a bargain with his Greek or Levantine friend, and that good feeling prevails amongst them to which successful commerce always tends.

The sky of Egypt had changed "the winter of our discontent" into "glorious summer" as we traversed the country, which formed one beautiful verdant plain covered with cultivation. The eye rests with pleasure on the lines of the evergreen acacia which mark the different routes—sometimes in single specimens, and sometimes in groves, interspersed with the lofty date-tree : boats of various sizes, under their white flowing sails, floating along the canal, diversify and add richness to the general aspect. Nothing could be more effective, as we approached Cairo, than the contrast between this verdant plain, waving with corn and trees, and the sun-burnt cliffs of the Egyptian desert ; and well might Amru, the Saracen conqueror, fresh from the burning desert, exclaim—" Oh, Commander of the Faithful ! Egypt is a compound of black earth and green plants, and pulverized mountains of red sand ;" for here, on both sides, the latter approach the valley of the Nile, and form the gorge in which Cairo is built. Its Citadel, with its dome and lofty minarets, perched on a commanding point on the left cliff, forms a novel and characteristic feature of " Musr—the Victorious ;" while on the right, as the train proceeded rapidly towards the gorge, I perceived over an horizon of waving trees the sharp purple line of the eternal Pyramids.

The station at which we descended was primitive in the extreme—rough stone platforms ; no porters, or, if any, undistinguishable by either badge or dress from wretched Arabs ; dusty carriages, which had never since their arrival in Egypt been washed ; and crowds of men, of every nation, surrounding us. Arab women, clad in loose blue shirts, with breasts exposed and faces veiled, pressed us on every

side ; through whom, and troops of lazy dogs, I forced my way to that novel Egyptian luxury, a carriage ; and preceded by an Arab who ran before me, in true Ahab style I entered Cairo, and went at once to an hotel in the Esbequiah. The Esbequiah is an unenclosed extensive area, or " Place," thickly wooded, situated on the outskirts of the native city, and surrounded by the principal houses and hotels of modern Cairo. Noble acacia-trees form lofty bowers and promenades through it in all directions, which might be envied by the citizens of either London or Paris. Here, side by side, can be seen the squalid Turkish or Arab cafés, and the richly-decorated Parisian-looking resorts of the same name (of which they were the prototype) ; also elegant little theatres, with their bands of performing men and singing women. A masonic glance passed between me and one of the " true believers," in whose deep religious opinions and mysteries I had been initiated at Baghdad, and whose thoughts I could divine, as I sat one evening opposite him in the Esbequiah. From the narrow gloomy streets of Mahomedan Cairo, where women are sacredly veiled and infidelity is death, he wandered into this epitomised burlesque on European life. Fair and handsome, his long robes were gathered closely round him ; and with pipe in hand, and turban half raised, he sat down and sipped his coffee, while the European *danseuse* twisted her pretty form into every conceivable shape for our amusement : but instead of *asthughfurallahs* enjoined by his Koran, there was satisfaction in his face ; for, after all, it was only the habits of Frangistan he was admiring. He could always retire into the seclusion of his mosque, and pride himself on the proud faith, unknown in that immoral country, where they were all sold to the Shaitan, or Evil Genius.

In the eleventh century Hakem obliged the Christians of Cairo to wear a distinctive dress of some dark hue—green

and white were distinctly forbidden—and to carry as a badge heavy wooden crosses, nearly two feet long. Riding on horses was for them a punishable offence; and the mules and donkeys appropriated to their use were distinguished by black saddles, without caparison or ornament of any kind. They could retain no Mahomedan in their service. The proud followers of the Prophet of Islam gathered their robes from defilement as they passed; and they shrunk away whenever the Arab caliph, mounted on his white mare, proceeded through his votaries to his harem or his mosque: but now the French may truly say, *Nous avons changé tout cela*.

The Esbequiah is the great evening promenade for all the European element of Cairo. The greatest contrasts of the human race, both in religion, manners, colour, and costume, here present an interesting study to the philosopher; and here I had the good fortune of meeting men famous for their talent and energy, among whom I may mention Monsieur Haka Kyan Bey, who very much interested me in his descriptions of modern Egypt and the Nile, and the difficulty which existed in obtaining papyri, which, he informed me, were, as soon as discovered, seized by the Government, or bought secretly by Franks and Levantines, who, for commercial purposes, are now located in almost every village in Egypt. Here I was also fortunate in meeting Monsieur de Lesseps, and thus facilitating my wishes to visit the Suez Canal. It afforded me real pleasure to make the acquaintance of its *fondateur*, a man of such wonderful energy that, in the face of the most harassing opposition, he could organise and find the means to carry on such a vast undertaking, although one which every one here deemed perfectly futile, and characterised as throwing money into the sands of the Isthmian Deserts. The affability and politeness of M. de Lesseps, like that of all distinguished Frenchmen, were combined with talent and energy of no common order.

We appointed to meet at Ismalia, as I could not leave with him on the following Friday, having to visit S. A. the Viceroy. Afterwards he very kindly sent me a letter, addressed to all the engineers and agents along the line of the works, recommending me very particularly to their care, and stating that all modes of transport should be supplied free of charge ; which passport was underscribed by a list of the principal stations for my guidance. This he kindly sent to my hotel, together with a chart of the Isthmus, showing the various points of interest which are not laid down in ordinary maps.

There are many objects of great interest at Cairo. The city is purely Oriental, and very much resembles Baghdad. The Nile, Euphrates, and Tigris, are, in their general features, navigation, commerce, date-groves, and population, sister rivers. In the bazaars one finds the same type of men, the same costume, and the same description of articles exposed for sale. I was particularly interested in their embroidery, and that drab milled cloth on which they work the richest golden and silken tapestry ; so pretty to throw about a drawing-room carpet in England, and used as the *prie-dieus* of the Mahomedans. The Slave-market, as such, is extinct ; the Viceroy being obliged to put an end to its public display : but round the cloisters, as I may call them, still linger those who deal with the Mahomedans in the precious article of young Abyssinian slaves. The girls are smuggled in as the wives or concubines allowed by their religion, as they cannot pass them as their daughters ; and many curious stories are told of what they have to endure to escape the vigilance of the Egyptian doctors.

I rose at one o'clock one lovely morning, crossed the Nile, and passing through low, marshy fens, after a wearisome four-hours' ride, on a very good donkey, arrived at the Pyramids at break of day, so as to see the sunrise

from the summit. I immediately ascended the Pyramid of Cheops, assisted by the well-known Arabs; and while drawing breath, perceived an European undergoing the same manipulation from these wild, half-naked sons of the desert, who assist you to ascend the lofty steppes, or rows of rough-broken rocks of magnesian limestone. He was an Englishman; so we shook hands, and celebrated the occasion with a bottle of champagne and a hearty laugh at our naked savages; who, however, *naïvely* informed us that they added other articles of dress when ladies were of the party. Here one can ruminate *ad libitum*, and conjure up episodes full of interest in the history of the world—from the flight of the Israelites to the Battle of the Pyramids, coeval with the vast monuments we stood on.

But the digression would be too long; so back to Cairo. Its Museum is a handsome modern building; the rooms large, and elegantly inlaid with marble and Egyptian granite, &c., and enriched with a very interesting collection of papyri; together with other rare Egyptian antiquities.

I also visited the Nilometer, a solid building of masonry at the head of the Island of Rhoda, opposite Old Cairo.

A delightful chiosk and garden belonging to the Government (in which we were allowed to fill our pockets and eat as many tangerines as we chose) are passed through as you approach it. In the apex of the masonry is a well about twelve feet in diameter, down which there is a flight of steps; and on the opposite side of the well are two pilaster-like columns, marked off in cubits; on which "17" was clearly visible. Above the pilasters is a Cufic inscription, dating, I suppose, from the erection of the present structure by Mutawukkul-al-Allah, in the ninth century. The Nile has access there, and its height has been duly registered on this and its predecessors times out of mind; indicated by the measurements not commencing with the bottom of

the well, but several cubits below it: from "17" being marked, I was informed that that was the greatest rise of the Nile. The Government and the people of Egypt have a great interest in this, as the productiveness of the country is in proportion to the rise of the river—" *Quantum crevit Nilus, tantum spei in annum est.*"* There is erected over the Nilometer, on wooden pillars, a summer-house kind of roof, for shade and protection.

I had an interesting conversation with M. Haka Kyan Bey, an old Egyptian engineer of Mehemet Ali's army, mentioned above, who, regarding the Nilometer, dwelt with the enthusiasm of a scholar on its antiquity. The Nile year is calculated from one summer solstice to the next summer solstice. The river brings down annually enough of mud to raise the whole Delta by a gradual elevation of the soil, which it overflows, a digit in fifteen years: each digit is divided into fifteen noctas, each of which represents the annual average rise of the bed and whole delta of the river. They say, that in 360 years it rises on the Nilometer 1·7209 English feet, which is the Nile cubit of time and space.

The rise in 15 years is equal to 1 digit.

"	360	"	"	24	"	= 1 Nile cubit; 1·7209 English ft.
"	365	"	"	1	"	Sothiacal cubit.
"	1460	"	"	4	"	" = 1 cycle of Sothis.

Thus the Egyptian cubit was 1·7209 English feet, not 11·82852384 English inches, as some antiquarians have made it, if the above information be correct. 1461 years is the Sothic period, or 730 years before and after the heliacal rising of the dog-star, Sothis. Ships left for India at mid-summer, about its rising; hence it gave a name to the period.

In the evening I visited the Mosque of the citadel; its

* Seneca.

dome and minarets, built on the heights of the sun-burnt hills on the east of the city, command the whole valley. From its steep battlements I watched the sun set on the Pyramids over the distant Libyan desert, which appeared like a sea of fire, its burnt arid plains reflecting the lurid aspect of the sky. "There was a solemnity in the sunshine resting on those monuments—a stillness as of reverence," which arrested every thought, and made me pause and read from the volume unfolded before me. Cairo, its dusty roads, cemeteries, strings of camels, and its vast extent of houses and minarets, lay below : just above, in the side of the cliff, is a well sacred to Joseph ; and below is the battlement over which leaped the last of the Mamelukes. Further down, and along the foot of the arid range of hills to the north, is a detached line of Saracenic ruins, some very lofty, with domes and minarets ; there lie the tombs of the Caliphs of Cairo, mouldering in the worst state of dilapidation, though the inlaid marbles and precious mosaics attest their ancient magnificence.

Before concluding this portion of my narrative, it may not prove uninteresting to introduce a few statistical memoranda in reference to the Egyptian Government, its Debt, and the Suez Canal.

The Government of Egypt always descends to the eldest male heir of Mehemet Ali. This reduces the prospects of any governor in its future welfare to almost a simple life-interest ; and while it thus deprives him of motives for weakening the suzerain power, impels him to strengthen his family by amassing wealth and influence while in possession. The present Viceroy, Ismail Pasha, is 35 years of age, and has many children. His younger brother, Mustapha Pasha, is next in succession. Ragib Pasha, and an Armenian, Nubar Pasha, are among the most influential of his ministers. The latter treated with the Emperor in Paris regarding

claims of the Suez Canal Company for labour which the Viceroy found himself unable to supply, and for the re-concession of all lands — other than those required for the traffic of the canal — which under original concession became the property of the Society; for these claims the Imperial verdict awarded 84,000,000 frs. or 3,360,000*l*. The Viceroy has also 3,360,000*l*. of shares or interest in this undertaking: so that he has to find near 6,720,000*l*., raising the actual capital to about 10,500,000*l*., 8,000,000*l*. having been previously subscribed for, in 400,000 shares of 500 frs. each (including the Viceroy's), of which 400 frs. are paid up. Up to the present time, the whole of the public debt of Egypt is about 12,000,000*l*., contracted to meet the above works; not a very large sum, when we consider that railways and other public works are included in it. Two years of the present revenue from the Delta alone (3437 square miles of the richest soil) would pay off the whole debt. The private revenue of the Viceroy is about 2,000,000*l*. annually; which latter, though enormous, and scarcely to be credited, may be explained by the fact that the Viceroys absorb as much of the landed revenue or property (which in Egypt means about the same thing) as they can into their respective families while reigning: a course which may account for their private wealth.

CHAPTER II.

LEAVE CAIRO — BENHA — MINET-EL-GHUMHA — ZAGAZIK — ANCIENT CITIES —
 TOWING EXCURSION — ISMAIL PASHA — EL ABBAS — ROUTE TO TEL-EL-KEBIR
 — M. GUICHARD — GASSASEEN — RAMESES — LAKE ISMALIA.

I LEFT Cairo at 8 A.M. on the 12th November, 1864, for Benha. I found it necessary to take a dragoman with me, called Hassan, one of those half-Arab, half-Turk Mahomedans, who, to the commanding dignity of the latter class, adds the levity of the Frank—one of that genus of *valet-de-place* whom one finds haunting the doors of every European resort or hotel in Egypt. I exacted from him the duty of carrying the double travelling-bag, or *khoory*, which I had stored with tea, sugar, Bordeaux, brandy, biscuits, &c., from the carriage to the station, and of performing other small journeys on foot. He spoke French, English, and Arabic, but *all* very badly; he was best in the *lingua Franca*, and having been a good deal with Frenchmen he took a scolding with great equanimity.

We left the hotel at 7.30 A.M., and amid Turks, Arabs, and Levantines, waded our way to the ticket-office at a miserable window in a very dirty house, where I was amused by the manner in which a Frenchman abused the ticket-issuer; he not alone made him retract his words, but, amid a shower of abusive epithets, made him give back some change they were quarrelling about. The half-Egyptian half-Greek dress he wore, his stolid-looking face and awkward manner,

certainly lessened the sympathy I should have otherwise felt. Having secured my ticket to Benha and Zagazik, I found my dragoman as useless as myself in forcing a way through the crowd of Arab women in loose blue shifts, and all races of men. Now and then an European lady would dash by straight to her carriage, accompanied by one or two gentlemen in "wide-awakes" and white turbans, carrying some of the lady's necessaries of life. There were no porters to be seen; though, after I had secured a seat in a dusty, filthy, first-class carriage, luckily lined with yellow glazed leather, I perceived a fellow in a long green shirt showing some of that activity which led me to suppose he was the guard, or acting railway-porter. I sat opposite one of those characteristic fellows called Arnauts, who, leaving the banks of the Danube, have come to settle on those of the Nile: he had made Egypt, as most of them do, his country; and he looked as if he never could quit his mode of sitting, his pipe, or his pillau. He gathered his legs under him on the seat, and with his long pipe made himself comfortable, and exceedingly patronising; he felt quite delighted when I spoke to him in his own language, and as we proceeded on our journey we became great friends. He was going to Tantah, a village which he described as a most voluptuous place—plenty of rice and cotton, and dancing-slaves, &c.

We reached Benha at 9 A.M.—an hour by train, or twenty miles from Cairo. This is a considerable place on the Damietta branch of the Nile; it is the centre of the trade of the country to the East, watered by the Pelusiac branch, which we crossed at about seven miles from Cairo. We had to change carriages at Benha for Zagazik, and take fresh tickets. Nothing could be more confusing for a stranger: here were no signal-fingers or superscriptions indicating the right way; the platform, such as it was, was crowded with Arabs, Turks, and people of all nations;

and was lumbered with bales of cotton and camels. I wandered along to a hovel-like place, as I found my dragoman quite at sea, and discovered a native writer squatted on a board, who, in the most unconcerned manner in the world, took his time before issuing the necessary billet to the impatient Feringee, and then pointed to a few carriages across the plain in which we were to take our seats.

We left Benha at about 9.20 for Minet-el-Ghumha, which we reached at 10 A.M. We passed several trains on the road laden with cotton, while the whole country appeared like one dark cotton-field, interspersed with the usual acacia and mulberry-tree.

Minet-el-Ghumha is a fine village on a large canal, on which were numerous barges, with their lofty masts and picturesque yards and sails. Some houses here are well built, and of stone, several two stories high; while it also boasts of some extensive steam-mills with lofty chimneys, which mark the growing commerce of the place. The principal part of the cotton belonged, they said, to the Viceroy. In half-an-hour (10.30) we reached Zagazik, and descended from our carriages on to a dusty platform—for the rail goes no further. We could get no information as to where we were next to proceed, for there were neither police, station-masters, or porters; and the Arabs having nothing to gain, turned a deaf ear to our inquiries; while, to make matters worse, my dragoman, Hassan, was useless, save to stand with his wand in hand over the provision-bag and my small portmanteau. At last two urchins divined what we wanted, and took possession of the above articles, and as no one seemed to know where the French *bureau* was but themselves, we were obliged to accept their services; but, alas! in their eagerness, they managed to smash my only bottle of fine Cognac, which the proprietor of the *Hôtel des Ambassadeurs* had, as a great favour, furnished me with.

I kept my temper as well as I could, making use of some fine Arabic expressions of abuse to Hassan for his great skill in packing, and followed through the railway carriages and trucks the little urchin, who was now dripping with my fine Cognac. We wound our way through dusty, filthy Arab huts, to an open space, in which were piled pyramids of corn and seed of every description. This was the corn-market of Zagazik, through which we passed to the banks of a canal ; and only then gave our conductors due credit for their sagacity, on seeing a bureau-like looking wooden booth before us, and a Turkish cawas, of the perfect type, standing at the door.

Zagazik is a place of great commercial interest ; the country around, occupying the eastern shoulder of the Nile Delta, and watered by the Pelusiac branch of that river, is one vast plain of cotton and edra (maize), intersected with canals, and interspersed with groves of acacia, above which waved the date-tree and its massive bunches of yellow fruit. Besides a quantity of seed and corn, Zagazik produced last year 250,000 bales of cotton, and owns thirty steam-power cleaning and pressing cotton-mills : in fact, the place seems fully occupied with an industrious people.

Here commence the labours of M. de Lesseps, and the staff which he has so well organised to carry out his gigantic scheme. I at once introduced myself to M. le Comte de Romano and Baron de Latour, who superintended the transport service. The affairs on hand were quickly despatched, and I was at once attended to. Nothing could be more courteous and elegant than the manner in which my wishes were anticipated. My letter of introduction was quite unnecessary, as M. de Lesseps had already prepared them for my visit. We were at home in a moment ; and after pressing me to remain, which I could not do, as I wanted to catch *leur Président fondateur* at

Ismalia, they at once provided a delightful little boat, with a nicely-cushioned cabin on the poop, managed by two Egyptians, and tracked by two camels, each having an Arab perched on his back. I had already taken provision enough for the journey, now, alas! minus my bottle of brandy; but they insisted on adding some fresh stock, in the way of fowls and bread; and while they were being prepared I had a delightful *conversazione* on the bank of the canal with my hospitable French friend the Comte, who, with many good wishes, saw me on board my boat. There is an innate charm in the manners of a well-bred Frenchman which quite captivates a stranger, and makes him, if an Englishman, wish that that social quality could be added to the sterling character of his countrymen. He represented Zagazik as a lonely residence for an European; but they were greatly respected by the people, and their work gave them occupation, and even amusement.

I left Zagazik at 11:30; my cabin was most comfortable. The canal is about forty feet wide, with high banks; riding along which, my camel-drivers looked very picturesque as they sat on their lofty, grotesque beasts, and jogged their arms to their trotting pace, which was constantly interrupted by the tow-rope getting foul of some bush or unevenness,—events which roused all the energies of the Egyptian boatman at the bow, whose fine limbs and action presented a picture of itself, and very much amused me, particularly when, in his fine guttural language, with which I was familiar, he addressed abuse or praise to the helmsman squatted on the poop.

Zagazik is on the ancient Tanitic Canal, derived from the Pelusiac branch of the Nile. Ten miles south from this the ruins of the ancient city Bubastis* are found, in the angle formed by the two rivers. The ancient Red Sea Canals began a little above that city. To the north, on the Tanitic branch,

* Sacred to Pasht, or city of Pasht.

towards its embouchure at Lake Menzaleh, stood ancient Tan, or Tanis—Zoan of Scripture and San of the present day. The miracles of Moses are said to have been performed in "the field of Zoan," which is also mentioned in Isaiah.

Rameses II. is supposed to have been the Pharaoh of the Exodus ; his favourite residence was Tanis, or Zoan, and he embellished it with many obelisks. He was a great Asiatic conqueror ; and as Tanis was the nearest frontier town (as I shall show when I come to speak of Gunterah), his relations with the Asiatics and Israelites were more intimate than those of most Egyptian kings. The rich fertile field of Zoan lay just on our left, skirting the arid Syrian desert ; and right before us, and on our right as we proceeded up the canal, lay the ancient land of Goshen. This canal, with its lofty banks, was cut by Mehemet Ali, and is called Thurra-el-Hilwa. In about an hour, or at 12:30, I reached the Pelusiatic branch of the Nile, crossing ours at right angles ; passing under a bridge, we met here a number of fine-looking men, who, very soon folding their only habiliment on their heads, swam across the canal. On one occasion our tow-rope got foul of an Arab girl and upset her, but she only good-naturedly laughed ; by which I was glad to find she was not in the least hurt. An old Balaam-looking Sheikh, sedately seated on his donkey, was also upset by the same cause ; but he did not take his accident in such good part.

These were the only incidents of the towing excursion until we reached the bridge, after leaving which the date-groves increased on the right, and the banks became much lower, so that from the boat we could see the vast well-watered and cultivated plains of this land of the Bible, which is now opened up by the telegraph-wire and the rail. The former, supported by poles, accompanied us all the way ; and crowds of Egyptians or Arabs, of all ages and sexes, pointed to a public road on the right, crossing the

plain, which was bounded by low lines of desert hills, visible on this side, while on the left the "field" appeared interminable. My poor camels began now to lie down and growl, and got beaten for their pains.

The cotton plant covers the country. It is about the size of a raspberry bush, and would make capital cover for the wild boar and other animals; which, however, do not exist here. It was green with leaf, and bore a pretty yellow flower, which appeared curious and out of season, as the plants were covered with pods bursting with cotton. We called to our camelleers to halt; and, getting out of the boat, I gathered some of the branches, laden with flower and fruit at the same time. This is the season of the *racolte*, and we saw on our left the gathered cotton lying in heaps, resembling low lime or chalk-hills, which, I was informed, belonged to the Viceroy of Egypt.

Ismail Pasha is very much liked by the people: he is very active, and constantly traverses the country, assisting, by money and machinery, the chiefs of villages. His object is to make "two blades of grass grow where one only grew before;" and in this respect I have heard him styled the father of the country: and it really is delightful to see how the cultivation and trade of Egypt have lately been developed. The great motive power, however, is the enhanced price of cotton, owing to the unfortunate state of things in America; yet without the Viceroy's co-operation, and large loans to the villagers, the full advantages of such an opportunity would not have been secured. His Highness told me, that in every instance he was fully repaid with interest, and expressed himself indebted *de sa part* to the facilities afforded him by the English and other banks established in Egypt.

At 1.45 we reached Abu Mahomed, and came to a solid wooden swinging bridge, which they hoisted up to let us pass. Here we approach the low sandy hills of the desert;

and here the plain of the Wādy* commences that runs like an inlet between them, forming an oval oasis of about 12,000 hectares, or 30,000 English acres, bearing due eastward, and enclosed by hills, forming a distinct property, formerly in the possession of the sons of Mehemet Ali, but now purchased by the Suez Canal Company, I believe, for 2,000,000 francs, with the power of extending it as far as they can irrigate the soil. Along these hills and over the bridge is the great track or road leading into Syria, which skirts the Delta to Salaheyah and Gunterah, and there regularly enters the Syrian desert. This was the land of Goshen.

Suliman el Yousef, the chief of the camelleers, here approached me; and after a few Oriental compliments, and drawing his robes around him, produced a printed form for my signature, which stated that he had performed the service marked out in his way-bill, and which was filled up by M. le Comte Romano, with the date and hour of departure and nature of the service, "*à la disposition de M. Lynch;*" for here we changed our camels, relays of which are provided every three hours. A small *baksheesh* to the camel-leer was all they would accept. The hour of my arrival was noted, the document signed, and the fresh camels were already under way.

We left precisely at 2 P.M., and in ten minutes reached El Abbas, with the desert hills close in on both sides. This is an extensive village; and as boats laden with cotton passed us under sail, their lofty masts and white canvas looked exceedingly picturesque. At 2:20 the desert on the left had reached the canal. At 2:40 the cultivated plain on the right had extended, while the arid sand-plains had retired, although still keeping close on our left. The telegraph wire, taking a more direct course, had parted with us since entering the oasis, and at an angle of 30° had gone straight

* Wady is an Arabic word for valley, or depression.

to Tel-el-Kebir, which is about the centre of the wady and the residence of its chief.

The weather was so cool and delightful that I sat on the top of the cabin. Arab women in blue shirts, spinning wool or cotton; and lazy, idle individuals of the other sex, crouching between their knees, with their mud huts in the background, formed the picture. We passed a large brick tower, built by Mehemet Ali for observation or telegraph purposes, the plain on both sides being now extensive. At 4:30 we reached Tel-el-Kebir. This is rather a large and busy village. A well-built enclosure lines the bank, and camels and cotton-bales meet the eye as you disembark. Here an intelligent Frenchman placed himself at my disposal.

About a quarter of a mile distant rose a handsome European-looking house, surrounded by orange and date gardens; a road, gateway, and rows of trees enclosing an avenue, spoke of a homely and hospitable retreat. Here M. Guichard presided. I found him sitting in an open iwan,* surrounded by native chiefs and *employés*. He was a tall, handsome, clever man, wearing high boots and French chasseur costume. He very kindly gave me the necessary information, and sent his servant with me to the restaurant where I wished to go, as despatch was my object, in order to enable me to overtake M. de Lesseps; and particularly as I learnt from M. Guichard that he, with Madame and Mademoiselle Guichard, had only just dismounted, having accompanied M. le Président to the head of the plain—a fatiguing ride of twenty miles.

In a long, low building, close to the entrance of garden and avenue, were several rooms, arranged with forms and tables; this was the French restaurant, and over it presided a plain, but busy and rather dapper-looking, Frenchwoman: the adjoining room was full of French and Greek *domestiques*, dining. The soup was excellent; but one dish quite

* A room, or hall, entirely open on one side.

delighted my ravenous appetite. I found afterwards it consisted of the livers of small chickens, exquisitely cooked : it was delicious. As there is no pasture-land on the Delta sheep are scarce ; the Egyptian cook has, therefore, principally the domain of geese, fowls, and other birds, on which he can exercise his culinary talents. While enjoying myself M. Guichard joined me, and having discussed some fair specimens of the vintage of France, we walked together over the fields of cotton and Indian corn, which certainly, from the high state of cultivation, did the Company credit. He informed me the whole cost would soon be defrayed if the cotton-market kept at its price ; and I wished them every success when it led to such results. Good government, just taxes, and an enlightened chief, who was first in the chace of the wolf or hyena, and whose advice and assistance could always be depended on ; as also a prompt mode of settling disputes, which contrasted so favourably with the old system ; here tended to secure abundance and comfort. As we walked homewards he took me to see the carriage built for M. de Lesseps, but never used. The house was built by Mehemet Ali, as one of his residences. Madame and Mademoiselle Guichard appeared on the balcony as we entered, and we passed a delightful evening together, as my departure was postponed by a telegram from the British Consulate at Cairo, requesting me to take the British dragoman with me to Ismalia.

M. Guichard kindly accompanied me to my boat ; and we took our seats, not on the woolsack, but on the cotton-bales, until M. le Dragoman arrived at 10·25 P.M., when we immediately started for Timsah.

At 12·45 A.M. we reached Gassaseen, about ten miles from Tel-el-Kebir. Here the French excavations really commenced, and the banks of the canal were no longer clay, but low plains of pure sand. It was a lovely moonlight night,

casting the long shadows of my camels and their lofty riders across the desolate plain, as they trotted along at a rate of about five miles an hour.

At 4 A.M. we reached Rameses, the city built by the Israelites for Pharaoh. Rameses and Pithom were built by the Israelites, as mentioned in Exod. i. 11. But few are now the ruins, and only three coarse statues in red granite attest its name and site. They are the figures of a man, a woman, and a young girl—Rameses, *sa femme, et sa demoiselle*. The plain is now one vast desert region of sand. Here, at this time of night, we had some difficulty in arousing the French agent. I stood on the bank in the lovely moonlight, and shouted as Europeans can; and the camels came trotting down. So we started; and after a long track through this desert region, the banks being very low, we reached (on the right bank), at 6:30 A.M., *le point de départ* of the Canal to Suez; from which 3,600,000 cubic mètres of sand were excavated, at a cost of 700,000 francs.

On 13th November, 1864, at sunrise, we were standing on the wooden lift-bridge which spans the Suez branch. Its sides are faced with well-executed masonry, containing rectangular recesses, or grooves, exactly opposite each other; into which the ends of beams of wood are inserted, and let fall to the bottom of the water, with large spikes attached to them: so that they can be hauled up at pleasure. These beams across the Canal formed a lock, and kept the water up about three feet; by which the Suez Canal is lower than the one we were navigating. A large sluice, built in the same manner, is also added, to allow any excess of water in the Canal to flow into the low-lying basin of Lake Timsah. In half-an-hour from this bridge, at 7 A.M., we reached Ismalia, and the shores of that most interesting lake.

CHAPTER III.

LAKE TIMSAH—HÔTEL DES VOYAGEURS—TIMSAH HARBOUR—THE FUTURE CITY—M. DE LESSEPS,—INTERESTING DISCUSSION—DEPARTURE FOR PORT SAÏD — THE MARITIME CANAL — DESCRIPTION — EL FERDANE — LAKE BALLAH—GUNTERAH—THE SHEIKH AND HIS ARAB MARE—ARRIVAL AT PORT SAÏD — REFLECTIONS—STATISTICS—THE CLIMATE—VISIT TO THE HOSPITAL—MR. AYTON—DEPARTURE FROM PORT SAÏD—"THE FIELD OF ZOAN"—HALF THE CANAL "DONE."

THE Nile water, without any artificial lock or dam, brought us to the plateau on which Ismalia stands, about eight feet above the level of the Canal. The sun had risen to the south-east, over a series of sand-hills, which bounded the horizon on the Asiatic side; increasing in height, like the stages of a theatre; and presenting, as they receded, an inhospitable barrier of sand to the African traveller, who here stands on the confines of both continents, looking on Asia. On his left he has the plateau and modern buildings of Ismalia; to the right, lofty conical hills of sand sloped down to the deep basin of Lake Timsah, which reversed in its mirror-like surface their rounded outline. A thorn, or tamarisk, here and there peeped through the yellow sand; and the southern shore was green with reeds and brake, which, with the dark-blue shadows of the lake, formed a pretty picture, and a charming contrast to the wilderness of sand and waste around us. Lake Timsah is below the level of the sea, and



London. Published March 17th 1866 by Day & Son, Jamaica Road, 18th Street, St. James's Place.

I S M A L I A.

some thirty feet below the level of our Canal. I think Patumos—Pithem-Thoum of Antoninus—the city built by the Israelites (Exod. i. 11), is to be found in the modern name of Thimsah—Lake Timsah. Pi, as Bryant shows, meaning a barrier, or ridge.

Mounting the sandy bank we found ourselves on the plateau, and on a rather well-defined road, marked by telegraph poles, and furnished with a tramway for the purpose of carrying heavy weights from the Canal, as the sand was moving and difficult to walk upon. On our right was a large stone-built enclosure, guarded at the entrance, and with the French, "*C'est défendu*," over the door. Here were kept the animals and stores of the expedition. Right before us, at the end of the walled enclosure, and over our road, stood a very handsome and lofty *arc de triomphe*, some forty feet high, which looked very imposing. It led into a *place* formed by the walled enclosure on the west, and a fine stone-built, two-storied hotel, as good as any in Egypt, with the pompous title of "Hôtel des Voyageurs," written in large letters on an entablature over a handsome verandah, formed the north side; Ismalia, and the Canal and sandhills of Lake Timsah, forming the east and south-east—our right and front. We marched along this sandy road, on which were strewn barrows, trucks, iron wheels, blocks, and pieces of all kinds of machinery. Approaching the triumphal arch, and finding it was all constructed of wicker-work, one cannot but admire the ingenuity of the French.

Having chosen two nice airy rooms on the first floor of the hotel, looking south on Lake Timsah, I started off at 8:30 A.M., while the sun was yet cool and the shadows low, to visit the lake and obtain a few sketches. Two Arabs offered their services as guides. We crossed the Canal, and were immediately wading, knee-deep, through sand; the

hills being in some places so steep that I had to catch a few long branches of young tamarisk, which sent up their long shoots through the sand. The lake, which is imbedded in sandhills, is about five to six miles in circumference, and almost circular; its greatest diameter being north and south. I took up my position on a conical hill at its western extremity. To the south, in the direction of Suez, lies a valley commanded by a small, elongated, hilly plateau, called Gebel Mariam; where, they say, Mary rested when she fled with Jesus to Egypt. The hills towards the east recede and rise in an amphitheatre on that and the north side of the lake; where the eye (as seen in the accompanying sketch) is arrested by a factory-looking chimney and enclosure, from whence the water, which is carried to Port Saïd, is raised by powerful steam-engines. From this point to the hotel lay modern Ismalia, with its handsome *châlets* and pretty detached buildings, coloured white and blue. The scene, though barren, was extremely lovely; the lake lay like a mirror at my feet; the air was clear, exhilarating, and without a particle of moisture: so that, even though the flies (that plague of Egypt!) annoyed me as I sat sketching on that barren sandhill, I enjoyed the delightful breeze, and contrasted the lovely sky above me with that which envelopes London on almost any November morning. Ismalia and its glassy lake is during these months a delightful sanitarium for those suffering from diseases of the chest.

On my return to the hotel I found M. Gautier waiting my arrival, to acquaint me that M. de Lesseps expected me at breakfast at 11,—it was then 10:30; so he proposed we should visit the new city, called by M. le Président, "Ismalia," after the present Viceroy. Walking down the canal banks, we came to some very fine works in masonry which were in progress, and intended for locks and basins, where the waters



Lowell, N. H.

Lowell, N. H. 1858. (by Lake & Co. Limited) 1858. (by Lake & Co. Limited) 1858. (by Lake & Co. Limited)

L A K E T I M S E H.

of the Nile are to communicate with the Maritime Canal, which they can then raise above the level of the sea, if it should become necessary at any time to flush it. Lake Timsah is 11 mètres, or about 36 feet, below the level of the sweetwater canal; and it will be 6·50 mètres, or 21 feet, below that canal when the sea enters, which will raise the lake 4·50 mètres, or 13 feet. The average depth of the lake is 12 to 14 feet; it will, therefore, make a splendid harbour for ships, as it will have a depth of 27 feet—enough to float the largest vessel. It is also large enough to contain an entire fleet. Should the Canal succeed, this will become the grand harbour of Egypt; ships from the Indian Seas and the far-western Atlantic will meet on its waters; and Ismalia will be the emporium of the world. Commerce raised a Palmyra in the desert, and its arid wastes may yet, in Scripture phraseology, “blossom as the rose.” Here the disunited waters of our hemispheres will for the first time, at least in the historic period, again intermingle; and distant nations will be brought into easier communion, and dip their flags to each other in peace and good will.

From the lock we descended a deep cut to a very shallow canal, about 12 feet wide. “Voilà la mer Méditerranée!” said my affable companion, “and the boats which will transport us to-morrow to Port Saïd.” This was not, however, the Maritime Canal, which passes about two miles to the eastward, but a small junction formed to allow the Nile water to flow into the ship canal at the lock above mentioned.

We now proceeded to survey the long, straight streets of the future city, marked in most places only by the edge-stone of the *trottoir*, or pavement: they are very extensive, and cleverly laid out so as to verge on the principal public buildings and new open squares: there was the Rue de Napoléon—de Victoire—de Champollion—de Temple—all

bearing their names. There was the "Grand Place" marked out, in which stood the church, over which floated the flag of Jerusalem; there was the "Bureau d'Administration," surmounted by the star and crescent: the latter was a very handsome building, and so were the various detached residences, all built of stone and timber from the coast of Carmania, and ornamented with railed enclosures, balustrades, and gateways, which prove the skill of the carpenters at Ismalia. The French have at least, in this great expenditure of time, labour, and money, shown full faith in the success of their scheme, as the fine hotel and public buildings before us attested; or have they inverted the order which wisdom would suggest?

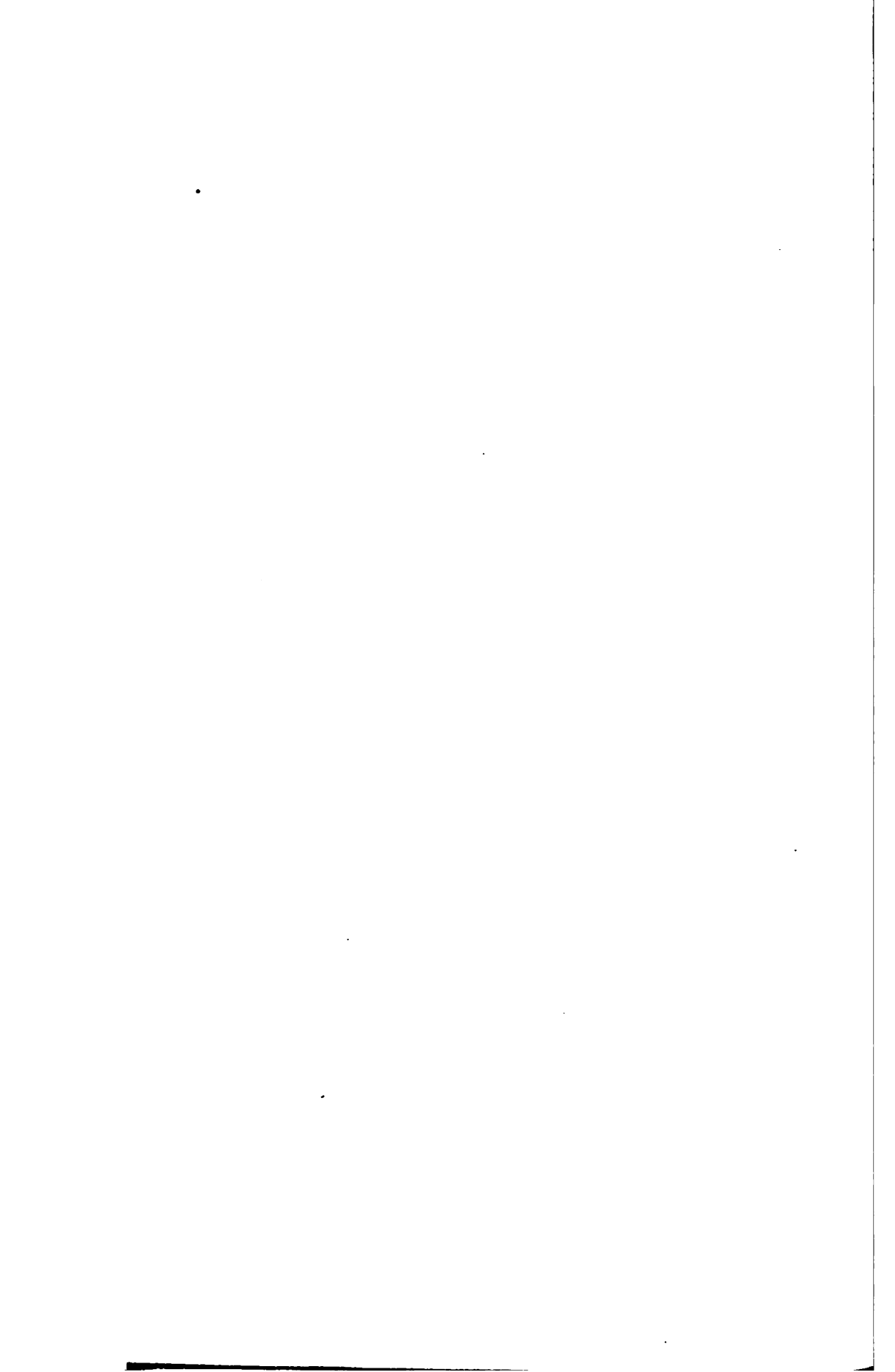
We were now on the steps of a charming chalet-like residence, where M. de Lesseps received me with graceful courtesy, and introduced me to Madame la Baronne de —, to her son, also to the wife of an admiral of the French navy, to M. Cellaire, M. Baron de Sala, and other friends and members of the expedition: the ladies were charming, and did great credit to their country. The gazelle and Parisienne might bear comparison, both in feature and charming gracefulness, and, as my note-book states, "in lovely eyes." After breakfast, M. de Lesseps offered his arm to the Baronne, and I had the pleasure of having mine also accepted, as we made a promenade through the house, premises, stables, gardens, and curiosities of modern Ismalia. The gardens abounded in beautiful plants, among which the cotton and the castor-oil tree grew most luxuriantly — one specimen of the latter, towering over our heads, with a stem of great thickness, was pointed out as of but one year's growth; and yet this was but sandy soil, for no loam was imported. They informed us it only required water to make it most productive, at which — as it was of that fine yellow description — we were all very much astonished, particularly as the Arabs said it was



Ismaïlia, Egypt, showing the harbor and the city.

ISMALIA NEAR THE BANKS OF THE SWEET-WATER CANAL.

Ismaïlia, Egypt.



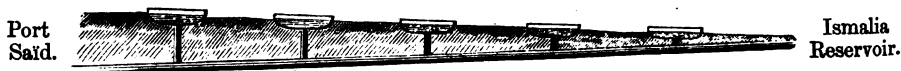
not productive; however, where there is plenty of water everything seems to spring forth with great vigour. A canal surrounds the town, and supplies each house with as much water as is required, — even for fountains and cascades; so the owners have all taken to gardening as a delightful occupation; and I was enabled to remark naïvely to my fair companion, that we do not always meet such flowers in the desert.

We now visited the bazaars and town: the married foreigners inhabit one square, and the bachelors the other. Our party honoured my *ci-devant* friend, M. Gautier, one of the latter, by visiting his overgrown garden and little bowers, of which he was justly very proud. There are 2000 foreigners at Ismalia, inhabiting the town. The Arabs have a camp about a quarter of a mile on the far-side of the hotel, the Egyptians being encamped on the opposite point; making altogether a population of about 4000.

On returning home, and on retiring, as all do, for a *siesta* during the heat of the day, I had a charming interview with M. de Lesseps, Baron de Sala, and the Doctor. The views of England and her ministry were discussed; and the latter gentleman energetically vociferated, — “*Laissons nous être volé, mourir, perdre tous,*” &c. &c. “*Opposition,*” I observed, “often led to success, and no one could but wish well to this great undertaking, the wisdom of which was in proportion to its feasibility. England, whatever her political views might be, did not wish to lead her people into schemes where she believed success impossible.” Here Baron de Sala expatiated on other advantages to be obtained: for instance, lawless Arabs being rendered into peaceful cultivators, and water supplied to Suez and to the travellers on the great Syrian road; of which more hereafter.

About 4 P.M. we visited the steam-engines and pumps

in the enclosure mentioned above, about a mile from the hotel. We entered a pretty garden in front, where played a large fountain, while miniature rivers, lakes, and cascades, everywhere surrounded us : in the centre was a large building, containing two powerful engines of about sixty horse-power, which raised the water of the Nile canal to the highest level of the plateau, iron pipes being laid down to conduct the water the whole way to Port Saïd ; open tanks also having been constructed at convenient distances along the road, for the use of the labourers and cattle employed on the Canal.



By the above diagram it will be seen such tanks could never overflow ; their existence was a first necessity, and their true value can only be appreciated by travellers in these deserts.

At 7 P.M. we sat down to an exquisitely-cooked dinner ; the Governor, Ismail Bey, being of the party. He sat next me, and we had a pleasant chat in Arabic, in which language he seemed quite pleased that I could converse with him. He informed me, that as the people were mostly foreigners, or under that protection, everything was conducted on the French system, even to the police regulations, and that he was a *roi sans sujets*.

On the 14th of November, at 7.30 A.M., we left Ismalia for Port Saïd ; the ladies, M. de Lesseps, and myself, occupying one boat, and some of our party, *employés*, &c., another : each of which was prettily decorated with Turkish and neutral flags. The air was fresh ; a clear, bright-blue light streamed over Lake Timsah, whose yellow sand-hills

formed a pleasing contrast. The blue mountains of the "Geneffe range," whose headlands end abruptly in the Isthmus on the Egyptian side, led the eye along the direction of the Canal towards Suez, to which M. le Fondateur directed our attention, while the high banks of sand were now closing in, and our camels and tow-rope above them formed our only *point de vue*. We were now in the junction, steering east and slightly north, between the plateau of Ismalia and the slopes of Lake Timsah, until we came, in about half-an-hour (at 8.10 precisely), to the highest connecting point of the two continents. Here the Company have built a very handsome *châlet* for the Viceroy : it commands this part of the Isthmus, of which you get a magnificent view on either side, and it occupies a position exactly half-way between Suez and Port Saïd, being 75 kilomètres, or 47 English miles, from each place. The Isthmus, however, from sea to sea, is only 70 miles. The *châlet* is raised on a solid terrace, and is built of stone, having a handsome projecting roof, which, with its rails and awnings, were made of handsome carved wood-work. It consists of a spacious divan in the centre, with rooms on either side, all handsomely decorated. It is very prettily situated, looking down on Lake Timsah ; having to the right the burnt-up plain extending to Ismalia, about two miles distant, and on the left the great Maritime Canal to Port Saïd. It passes El Guirz at the back, about a mile distant, which is the highest point of the Ismalian plateau, being 49 feet above the level of the sea.

After a short half-hour spent at the *châlet* we descended the banks of the Maritime Canal, into which our boats had entered ; they were 12 mètres, or 40 feet, high ; layers of friable sulphate of lime in their slaty beds were exposed by excavation, plainly indicating a deposit of sea-shells, above and below which lay beds of small, fine, shifting

sand, which, however, appeared to harden when brought into contact with water.

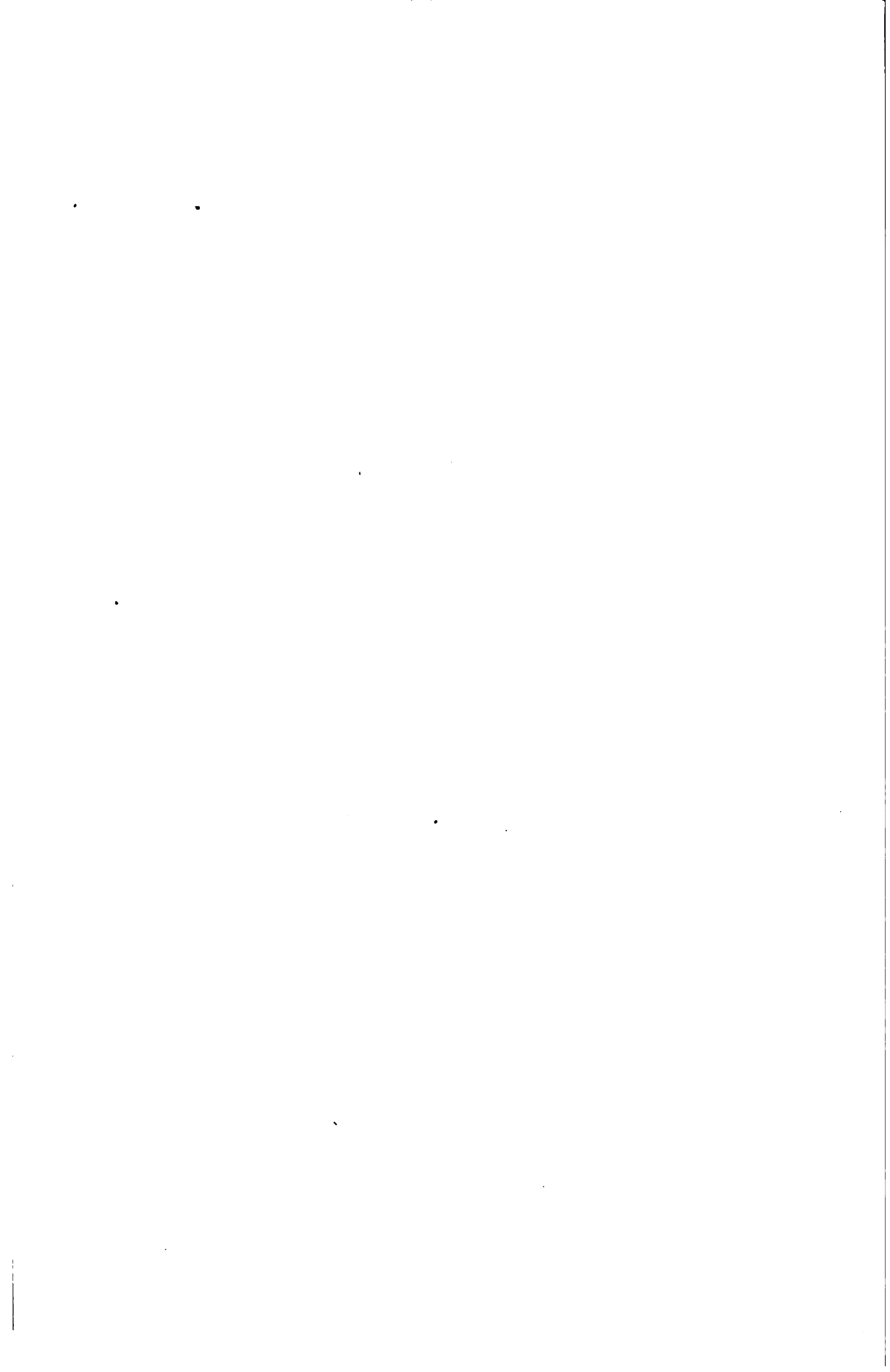
The Canal was about 20 feet in width, and only a few feet in depth ; it is to be 58 mètres wide at this level, and 8 deep—more than sufficient for the largest ships. We went down to El Guirz, which place we reached at 9 A.M. ; the banks here are 18 mètres above our canal, or sea-level : this, being the highest point of the Isthmus which the Canal has to pass through, the works assume a stupendous aspect. We ascended the banks to a small camp-looking town, where I was surprised to find a locomotive dépôt ; rails and heaps of waggons and tramways intersected each other in all directions. Here the work was in full operation. We all mounted a tender, and were conveyed by a locomotive to a vast sand-heap, where some forty men (apparently Levantines) were filling waggons on the rail ; the level being so arranged that when full they discharged themselves in a depressed part of the plain, illustrating the great facility afforded by the waggon and tramway. We then proceeded for about two miles along the Canal north, to where some dredging-machines were at work, which cut away the dry sand-sides from a depth of twenty feet to the top of the bank, where, situated on rails, each machine emptying the sand into waggons, filled seven of them in fifteen minutes : the buckets cut through the thin whitish layers of lime-slate as easily as the sand, and as far as they had gone—and they had sunk wells and pits—not a stone sufficient to obstruct the machines had been discovered between this and the sea. As the machine cuts the banks perpendicularly it moves itself along the rail, and the latter, attached *en masse* to the sleepers, is easily adjusted in the moving sand to a proper distance from the bank, by a few men with handspikes. There were not many Arabs employed ; they were principally Maltese, Greeks, and Ionians. The



LONDON: Published March 1870, by DODD, STUART & LUTHER, 5, MARK LANE, near ST. MARK'S CHURCH.

DODD, STUART & LUTHER.

DREDGING-MACHINES AS APPLIED TO DRY-LAND EXCAVATIONS



simplicity of the excavation by the means which science has thus so wonderfully applied, convinced many of our party of the feasibility of the vast design, which M. le Fondateur now designated as simply a work for the dredging-machine, and one happily exempted from that awful sacrifice of human life and labour which formerly attended similar Egyptian enterprises, in one of which 120,000 Egyptians perished. If the quantity of earth or sand to be excavated were placed in gufahs one after another, they would form a line which would three times surround the world.

The Egyptian Government had engaged to furnish for the undertaking contingents of workmen ; but as this led to compulsory labour, and, in other words, to a species of slavery, and as the unfortunate creatures, transported from their families against their will into the desert, were struck down by death in great numbers, frequent appeals were made to the Government, which led to its suppression. This action, whether rightly or not, was attributed to the policy of England, as "aiming a blow" which their wildest enterprise "would not be able to parry," although in the present age its humanity was in itself a sufficient justification for the change. It, however, obliged the Company, at great cost and loss of time, to replace *le travail des hommes* by that of a more effective power ; and whatever the policy, or whatever the cause, the result, as we have seen above, has been attended with greater efficiency, to the satisfaction and happiness of all concerned.

We now returned to the village of El Guirz, and entered a pretty garden, similar to those already described, with a fountain in the centre, where a capital *déjeûné à la fourchette* awaited us ; to which we all did justice, and which was enjoyed by a most delightful little party. International feelings of good will and welcome beamed in the face of our esteemed host, and wit, happiness, and bright eyes, added

their charms to the associations of the position and enterprise. The flies, which Baron de Sala assured us came with the *ouvriers*, were the only thing the absence of which would have been desirable, and I hoped that the little birds, having now something to perch upon, would soon come and make their *déjeûné* off them.

Our pretty mariner's wife, accompanied by some of our distinguished friends, returned from this place to Ismailia; and, bidding good-bye, I could not prevent my expressing to M. de Lesseps, "Nous allons perdre la moitié de notre *kaiif*;" and received in return—for I was overheard—a glance from those bright eyes, accompanied by a most gracious smile. There is no one word which can express this kind of enjoyment in fellowship better than the Arab word *kaiif*, and my French friends seconded the observation as to their language also. The same locomotive being at our disposal, our now reduced party proceeded in it, at twelve at noon, about three miles along the Canal, and there rejoined the boats, which had preceded us. The Canal banks became much lower as we advanced; and at Ferdane, about nine miles from Lake Timsah, which we reached at 1:30 P.M., were nothing but sandy knolls.

El Ferdane is at the head of a string of lagunes, which extend down to the Mediterranean. It is famous for its shifting sand-hills. From their formation and the layers of sulphate of lime, which can be detected in the banks of the Canal through which we passed from Lake Timsah, and which are evidently beds of a shell deposit, as above alluded to, one can justify the conclusion that the sea once certainly extended to the latter lake, if not quite across the Isthmus; for here we saw the *modus operandi* of occupation going on in the accumulation of sand, which the neighbouring deserts of Asia and Africa send down by every whirlwind, of which these high knolls are the formidable pickets. Monsieur le

Médecin assured me, an Englishman once pitched his tent on one side of a sand-hill, and in the morning he found that, during the night, it had shifted to the other side. This exaggeration is intended to illustrate either the nature of the country or an Englishman's idea of it; and the fact is, perhaps, attributable to his overwrought imagination: for I ascertained that the shifting sands form no impediment to the construction or maintenance of the Canal, as is supposed in England.

At 1.45, or 15 minutes from Ferdane, we entered the first lagune, called Lake Ballah. The Canal assumes its full width here; and a party of Arabs, with crowbars, piles, and brushwood, instead of removing, were hardening and stamping the banks down.

The lake on either side is slightly below the level of the Canal, as, owing to the great evaporation, the lagunes are below that of the sea; the Canal is, consequently, deeper than the lagune, and we have enough water for our boats, though the lake is in many places only eighteen inches deep, and is generally very shallow. Our camels and drivers drank at the tanks, supplied by the pipes from Ismalia; and, being refreshed, trotted along the bank.

M. de Lesseps takes a *siesta* on the stern-seat of the nicely-cushioned little cabin; while the French lady, my *vis-à-vis* on the side-couches, is increasing her wraps, as the air commences to be cold and damp.

At 4 P.M. we reached Gunterah, on the great Syrian route into Egypt. The sand-hills are darker, and the brown deserts on either side of the lake closely approach each other, and allow of the lagunes being at this place spanned by a bridge, which its name signifies: at present, a floating one answered the purpose. Look at the map of Egypt, and you will perceive that the Delta, watered by the Pelusiac branch of the Nile, tending to the eastward, encloses between itself and

the line of route we have followed the great desert of Salahyah to our left. We left the Delta at Abu Mahomed, Tel-el-Kebir, and here we are again close to it, as it extends to within a few miles of this old place, and evidently water was conveyed from thence to render this first entrance to the Syrian desert inhabitable. The dark nature of the soil, and the hills of ruins and bricks scattered in every direction, speak to its ancient importance. It was one of the frontier cities of Egypt as you entered the field of Zoan, and was called in ancient days Mèsès;* where, the Egyptians say, Orus was born. He was one of the oldest deities of Egypt; and if representing (as the Greek Apollo) the warmth of the sun, would be here appropriately worshipped on the confines of the desert before encountering its intolerable heat.

According to Wilkinson, Horus or Horat (with whom he is confounded) is also represented by vultures' wings and asps—typical, I think, of the marshy abodes of the latter and of the associations of the journey; as the former animals, the sole presiding deities of the road, keep their watch for the carcasses of camels and other animals which may succumb to the heat and drougt of this great desert route into Asia. In all probability this was the spot at which the migration from Asia entered Egypt, and must, if the latter place were first peopled by the Aryan and Scythic tribes, be of the remotest antiquity. There is also another curious fact coinciding with this view, that the representations above

* Mèsès has been recognised by antiquarians as derived from Mesu, or Mesī, "to bring forth." He was called Moses, for Pharaoh's daughter "drew him" forth "out of the water;" and the root *mes* enters into the composition of many Egyptian names,—as Amosis, Tethmoses, Rameses; and Josephus derives the word from water. Το γὰρ ὕδωρ μὲν οἱ Αἰγυπτίοι καλοῦσιν. See Sir Charles Nicholson on Hieroglyphic Inscript. page 15. This place was, therefore, both in respect of water and birth of Orus, &c., appropriately named.

mentioned are found over doorways and façades of buildings, showing how this god presided over the entrance to Egypt.

Forming into different parties, as the exigencies of the time and place required, we found ourselves wandering over a dark arid plain in search of our *chef*, and came in fifteen minutes to an encampment of huts, some of which were of a very good description : they occupied a rising ground, about 800 mètres from the Canal, and were all in lines forming streets, which were dignified with such names as Rue de Richelieu, &c. ; over a double hut, where two roads met, was written in large letters, "Hôtel des Deux Mers." They were all built of bricks gathered from the surrounding ruins. A very pretty *châlet* occupies the highest position ; it was the hospital, in which we found four men *au lit*, all apparently very comfortable and well attended to. The Doctor appeared a clever, nice fellow, as all the French I have met with in this expedition certainly have proved themselves to be, always supporting difficulties from pure *esprit de cœur*. While I was enjoying their conversation, M. de Lesseps introduced me to an Englishwoman : her husband, a foreigner, was one of the principal *employés*, and she had been so long away from her country, that she had almost forgotten its language ; she, however, warmly patronised me, and made me sit at her table and taste her orange liqueur and cognac, which were capital, and gave me quite an appetite for the excellent dinner which was provided for us by our kind host.

At about 7 P.M. we wended our way back to our boats, passing a large caravan of camels kneeling and chewing the cud ; they had just arrived from the Arabian side, and my attention once more hailed that picturesque object, an Arab at the tank watering his mare. She was quite white, beautifully proportioned, and followed by a little colt : the long

dress of the Sheikh, as he stood leaning on his spear, was quite imposing. They refreshed themselves at a long and wide trough, made of a white plaster, which, as explained above, was constantly kept filled with fresh Nile water from Ismalia. How grateful to the hungry and thirsty caravan, which had not tasted good water for a week together! and how thankful they, at least, should be to French enterprise!

At 7:30 we rejoined our boats and passed down the Canal, through the shallow but extensive lake Menzaleh, to Port Saïd. The bank on the left for these last twenty-six miles was complete, along which our camels tracked us over the shallow water. We passed immense quantities of flat-bottomed iron mud-barges, and several gigantic dredging-machines, apparently deserted, over which our tow-rope had to be cleared; which frequently roused us from a nap in which we endeavoured to indulge, and which I afterwards regretted, as I caught cold during the eight hours spent in crossing this cold, damp, marshy lagune.

At 3:30 A.M. we reached the low bank of yellow sand, beyond which we heard with pleasure the roar of mighty ocean, and facing which the *châlets* and low houses of Port Saïd are erected. Having disembarked on the left, or western bank, we proceeded over rails, machinery, and beams of timber, to the sea-shore; along which we had not proceeded far before my kind host pointed to the few steps leading up to a pretty low *châlet*, in which everything was provided for our reception; where, for the few remaining hours of darkness, we retired to rest, having spent thirteen hours in actual travelling from Ismalia. As the morning rose, however, I found myself alone, wandering, like Homer's seer, along the shore of "πολυφλοσβοιο θαλασσης." The Mediterranean was rolling in, and the shore was so low that a few inches in its level left bare, or covered, small plateaux of that fine yellow sand of which it was composed.

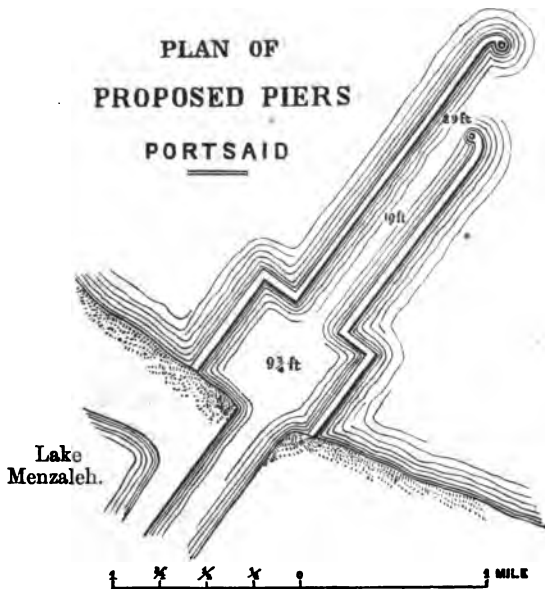
I walked towards that famous pier, the practicability of which interests the intellects of Europe and the world ; and which with the Canal, if successful, will, it is said, revolutionise the trade of the East, and the empires based on its commerce. Strange would it be if the latter should return to the channel it pursued in ancient days ; when, at the rising of the dogstar, or at Midsummer, the Arab of Southern Arabia launched his frail bark before a wind which he knew would blow steadily in one direction for months together, and would waft him to the shores of spice-bearing India, to return home laden with its precious produce before an equally propitious gale from the opposite quarter. From these inhospitable deserts, which mysteriously surrounded their transactions, and made the world believe they were the producers of the precious treasures they imported, caravans yearly arrived in Phoenicia, Egypt, Petra, and Palmyra, rendering those cities the emporia of the world. And it is curious that from these very shores the first successful voyage round the Cape of Good Hope was, as Herodotus relates, effected during the reign of Pharaoh Necho by his Phoenicians. A large steam-vessel of 1196 tons, "The Scotia," lay about three miles from shore in the offing ; she could approach no nearer, and, if the wind rose from the north-east, she would soon be obliged to put to sea to avoid a lee-shore. As the dangerous winds are from the north-west, had the harbour been made at Pelusium, fourteen miles nearer Suez, instead of Port Saïd, it would be impossible for ships to stand out or work off the coast ; they would be inevitably caught in the bight formed by the Syrian and Egyptian coasts.

Standing on the pier, which is about 200 yards in length, I met some intelligent workmen, who ingenuously recounted some of the difficulties against which they found it almost impossible to contend. A barge, which had passed up laden

into the Canal, was unable to descend empty, owing to the silt. The water was then flowing from the Canal into the sea. This occurs when the small tide causes a difference in their levels; and a bar will consequently always exist, but which a dredging-machine can keep clear, if it do not well up from below or the sides give way. The sea-beach moves in an easterly direction, and has filled up a considerable angle on the western side of the pier. And illustrative of this, they pointed out a shed which was, six months ago, the commencement of the pier in the sea: it was now thirty yards in-shore.

At the extremity of the pier, and about one hundred yards from it, is an island breakwater, formed of large blocks of rock and conglomerate, rudely thrown together; the pier is to extend to it, which will then make it about a quarter of a mile long. After breakfast, in company with M. de Lesseps, we went round it in a boat, and I learnt that the depth of water on the east side of the Island-pier was $5\frac{1}{2}$ mètres, or about 17 feet 6 inches English; while that on the west, or drift side, was about 4 feet 6 inches less—an ominous feature: and I also perceived a cape forming to the eastward, which extended far beyond the extremity of the pier. M. de Lesseps observed with satisfaction, that though the sand encroached on the pier, yet the depth of water at its extremity rather increased; which may be accounted for in this way,—that while the pier presented an obstacle to the ocean current, it would increase its rapidity round it; and, consequently, no deposit could form. But would not this state of things cease as soon as the shore to the westward of the pier was on a line with its extremities, and the above bank was fully formed? I hope, for the sake of the enterprise and my good, kind friends, that my suspicions are wrong. The following woodcut illustrates as nearly as possible the plan of the pier when finished, and the

depth of water calculated upon, as explained by M. le Président.



The soil on which Port Saïd stands is composed of sand, alluvial mud, and salt; the vast lagune and dark, oozy plains of Lake Menzaleh, are immediately at the back, in some places covered with an incrustation of salt. So great is the evaporation, it is twice as salty, and generally below the level of the sea, which, when a gale of wind from the north-west assists the slight tide, breaks through these low dunes, and carries with it fresh accessions of that mineral to re-incrustate, for the water soon evaporates, the layer of mud which the Nile yearly deposits over its whole surface. An oozy bed of salt, light sand, and alluvial deposit, is thus formed, which is of very great depth, and in the presence of water impossible to fix: it bubbles up, "*se soulève*," as you deepen the Canal. A whole tumulus of it will soon disappear if water touches its base, as one of the overseers at the pier illustrated; at the same time alluding to a dispute

consequent thereon then existing between M. de Lesseps and a Scotch contractor. If the whole of Lake Menzaleh is thus composed, it will be next to impossible to cut a canal thirty feet deep through its oozy bed, which, if not encased in iron troughs, will, from the centre and sides, constantly well up, rise, and fill in : this, however, can only be proved by experience ; and here, first, the practicability of the Canal should, perhaps, have been tested.

The air at Port Saïd is from the above causes, being charged with salt and humidity, extremely oppressive : and for those suffering from asthma or chest complaints it is intolerable, but for those not thus affected it is healthy. The lake is full of fish, from which, at the town of Menzaleh, a large revenue is derived ; ducks and all manner of wild-fowl also abounding.

Shut in between the lake and the sea, Port Saïd is built on made land, the Swiss-looking cottages along the shore occupying the highest point, yet they have their ground-floors raised ; and the lines of houses and bazaars in the rear are protected by broad dykes, and some of them built on piles, having ladders or steps of wood up to the doorways. There is a population of about 3000 souls, principally Ionians, Greeks, and Maltese. In the evening M. de Lesseps took us for a promenade through the bazaars, and the new docks, which, though not deep, could float some scores of gigantic dredging-machines, and a vast quantity of new barges, of great size and capacity, which lay therein. This was their grand dépôt ; and here I found an amount of plant worthy of a first-rate iron ship-building establishment,—all arranged in large sheds, in which they exhibited steam-saws, hammers, and other machinery, familiar to those conversant with the naval yards of Woolwich or Portsmouth, with which Madame la Baronne seemed much interested. We also visited a very curious oblong

block of red stone, about two tons weight, with a hieroglyphic inscription on its base and up the sides. It was brought from Gunterah, ancient Mèsès, and was in a shed belonging to one of the *employés*, covered over with great care.

We afterwards visited the hospital, where I spoke for some time to a sick English engineer, a very intelligent man. He was quite satisfied with the care and attention he received, and introduced me to a young Irish Sister of Mercy from Dublin, who tended his wounds and administered gratis to his wants. At her solicitations I entered the little chapel, in which her whole soul seemed centred. She gracefully bowed before the altar, and swept reverently past its mystic figures. The painted images, candles, and bits of rags, were, however, in my opinion, out of place. I rather pitied such weakness, but spared her any expression of my feelings on the subject; and paying the tribute usual on such occasions, and due to her solicitous care of my countrymen, many of whom were engaged in the machinery department, I joined my party.

It is worthy of remark, that a great part of the material has been brought from Scotland; and the whole belongs to the Company, not to the Contractors. The dredging-machines were of immense power, capable of raising and discharging into barges 1000 cubic mètres of mud and sand per day. The principal Contractor having had a dispute with the Company, they were all at a stand-still. The great difficulty will be in discharging the barges, for the lake is not deep enough to allow them to enter and discharge themselves, as at home, through a valve at the bottom; and as it must nearly all be discharged by hand, shovel, and barrow, to keep the dredging-machines at work an enormous quantity of iron barges have been provided by the wise foresight of M. le Président fondateur.

The company had engaged the services of Mr. Ayton, well known for his works in deepening the Clyde, to dredge the Canal from Gunterah to the sea, they finding material; which he undertook to do, and to be paid as the Canal was deepened by so many cubic mètres. He inserted, however, in the contract before leaving home, that should the sand be driven by the wind back into the Canal—an idea prevalent in England—he was to be indemnified: but he found a very different agency at work than he anticipated; for, as fast as he dredged, the ooze heaved up from below—*un soulèvement de terre*—which rather astonished him, and filled the Canal almost as fast as he dredged. He accordingly requested that the cubic quantity of sand lifted by him should be measured, and that he should be paid accordingly: this was to change the terms of the contract, and open a door to the possibility of unfair play, as sand was plentiful. I assisted M. de Lesseps in placing the affair in its proper light,* and only mention it here as having reference to one of the difficulties above alluded to. While this dispute annoyed M. le Président, he was, on the other hand, very much pleased with another contractor, who undertook to finish the construction of the pier very shortly, by the blocks of artificial stone which he was manufacturing on the other side of the Canal in large quantities; composed of 45 per cent of hydraulic lime or cement from Thiel, in Holland, and 55 per cent of sand and stuff extracted from the excavations of the port, which, after three months' exposure to the sun, become quite hard, and fit for the construction of the pier. A machine of 60-horse power is employed for grinding and mixing the material, and, by the means of rails and portable winches, for transporting the same in the raw state and in blocks to their destination. They can produce 8000 blocks,

* Since then the contract has been cancelled, and Mr. Ayton has received as an indemnity 8000*l*.

20 tons weight, 10 cubic mètres each, annually; of which, for the two jetties, it is computed that 25,000 will be required.

In the evening, it being the 15th November, 1864, and the fête-day of the Empress Eugénie, I accompanied M. de Lesseps and party to the chapel, to hear a *Te Deum* sung in honour of the occasion. We met the Greek and other priests, not of the Romish Church, also wending their way in the same direction, having merged their differences in respect to their President, who particularly desired it. The Governor also attended—a Mahomedan. No one seemed to understand the ceremony of priests and boys performing evolutions, or took further interest therein, than being in attendance. M. le Président, the Mahomedan, and our lady companion, stood side by side before the altar, forming a strange group. The ceremony was short, and the singing by the nuns good. We afterwards retired to a very extensive shed, called “the Club,” where about one hundred people were assembled in groups round a piano, card, and billiard-tables. They were the chief people in the place, and many of their ladies attended. They drank punch, and amused themselves. The Empress’s health was drank in champagne. There was, however, little enthusiasm; and I was about to propose the health of our President, when he prevented me. They were a very mixed assembly, gathered out of every nation.

We left Port Saïd at 7:30 A.M., on the 16th November, 1864, having bid adieu to M. de Lesseps, who kindly accompanied us to our boats, assuring us of his regret at not being able to see us to our journey’s end; for which, however, he was good enough to depute the Doctor, in whose agreeable company we retraced our steps through Lake Menzaleh, on the comparative geography of which, and on the ruins of Tooneh; on an island a few miles off, I may make a few remarks; where, however, there is now nothing in the least attractive,

or worth a visit. The lake was formerly, as above noticed, called Tanis, or that of Zoan, or Zan, or Tan, then the capital of this part of Egypt, and the waters were sweet. It was surrounded by the most fertile districts, called in Scripture "the field of Zoan." Strabo mentions fields and villages on its site; and the word *νομος*, used by him, curiously corresponds with the *أرضاً راءة* (pasture lands)* of the Arab geographers, applied to the same district. The latter call the lake Tanis, *تنيس*, from *طينة*,† clay or mud; and it is worthy of remark how that characteristic runs through all its appellations, down from the Hebrew Tan, which means clay, and the Greek *πῆλως*, found in the modern name Pelusium. The Arab geographer, Masoudi, mentions the water of the lake as sweet; and after him, Makrizi. The former relates an incident not uninteresting here.

A Copt was, in the tenth century, taken before Ahmed ibn Toulun. He was 130 years' old, and stated that the whole country now occupied by this lake was once the most fertile and the richest in Egypt, covered with towns, and was a day's journey from the sea; but that in the 250th year of the era of the Martyrs, dating from the reign of Diocletian (554 A.D.) the sea broke in and flooded the whole country, and all the villages, with the exception of Tooneh, and others situated on high ground, were submerged, and that the surviving inhabitants carried their dead to Tanis.‡

We see in the above a corroboration of the fertile description of the country occupied by the lake, and the anti-

* Could this be the land of Goshen?

† ط and ت are often permuted in Arabic.

‡ Since writing the above, Sir Charles Nicholson has published in the *Transactions of the Royal Society of Literature* some funereal hieroglyphic inscriptions found at Memphis, of which the following are translations:—"Habitans Tannen dominus veritatis Rex terrarum duarum." And on another inscription:—"May Ptah be propitious; he who was born in the land of Tannen—Lord for everlasting."

quity of Tan, or Tanis, in the survivors carrying their dead there, as to an old and holy place—a custom peculiar to the Orientals of the present day.

But, to return to my personal narrative, we passed rapidly along the Canal, changing camels continually. The air was so heavy at Port Saïd, and, consequently, having slept so very indifferently there, I felt quite relieved as we approached Ismalia; and having very selfishly occupied a whole bench in the cabin, I slept from 5 P.M. to 11, which the kind sweet accents of a lady's voice partly encouraged, by assuring me I was in no way incommoding her. When I awoke, the camels were trotting along the sandy bank to the sound of that wild, melancholy love-strain of the camel-leers' song, who looked most picturesque in the moonlight sky. We reached Ismalia at midnight, having, in English phraseology, "done half the Canal."

CHAPTER IV.

THE CANAL WORKS—HISTORIC RECOLLECTIONS—M. CAILLET—SKETCHING—
STATISTICS—THE BITTER LAKES—ABU GHUNNUM—MAHOMEDAN DOCTRINE—
GEBEL AKABA—THE PHARAONIC CANAL—ARRIVAL AT SUEZ—CONCLUSION.

AT 9.30 on the 17th we mounted some beautiful Arab horses, which were presented on several occasions to M. de Lesseps, and rode round the east shore of Lake Timseh to the canal works on the other side. It is taken through a high level, and out of its direct course, in order to enclose a table-land, which forms a fine military position, and to which Abbas Pasha gave the name of his son—Tússún. It is a long distance from the "sweet-water" canal: and camels have to carry that necessary of life for the use of the few families whose houses enclose a little square on the plateau. The Canal was here cut in detached portions; in some places to its full width, and sufficiently deep to float the dredging-machine when the sea was admitted. An intelligent Frenchman presided over the works, which were here entirely carried on by manual labour, and in the old style.

From a hill we descended on a plain, having the high banks of the Maritime Canal on our left, entering through a narrow cut, which gave access to it. We disturbed several enormous vultures, the largest I had ever seen. The banks of stuff removed from the Canal were some forty feet high. It was cut here to its full breadth, through dark sand and clay; but not more than fifteen feet deep. Following my

companion, it required good horsemanship to sit our Arabs, as they cleverly surmounted the rough knolls of clay and sand, and get past the carrion which strewed the defile. We soon, however, got again on the plain, which from here extends in one dead level to the Bitter Lakes, presenting a flat horizon in that direction, and also in that of Suez. The beautiful headland of the Geneffe mountains terminates in this plain, which scarcely presents a single undulation, and is here 11 mètres above the level of the sea. As we galloped across it my companion informed me that the place was called Serapium, and that there were the columns of a temple of Serapis not far off. But being, as he represented, not worth a visit, we proceeded to the little village of that name; on approaching which he descended from his horse, and removing about six or eight inches of sand, he pointed out the substratum of fine alluvial soil; from which we concluded that the waters of the Nile once flooded this plain: which was corroborated by our subsequent visit to Bir-abu-Ballah, a village in the plain, about two miles on the right, close to and on the far-side of the sweet-water canal; to which place it was proposed our boats should be sent, but we preferred starting from Ismalia.

Serapis, whose temple and worship were here sacred, was a modern god amongst the Egyptians, and a compound of Apis and Osiris. He was regarded as Pluto, and some say as the Sun. His worship in Egypt was first introduced from Sinope, in the times of the Ptolemies and Romans; and a city may have been established here, under the protection of that deity, contemporary with Berenice and other towns, which in that age rose as commercial dépôts on the deserts of the Red Sea. Antiquarians say the Egyptians had an objection to his worship, as being a modern and foreign god; and his votaries, therefore—perhaps commercial travellers—only succeeded in such out-of-the-way places.

We rejoined our agreeable and distinguished party, all on horseback, near the village of Serapium, which is very extensive. Gardens of lovely bloom and cultivation, and sandy plains and desert wastes, were in close contiguity, and the verdure delighted us as we approached this little oasis, where we were surprised to find a horde of Arabs, with their women and children. Before a branch from the sweet-water canal was cut to this place it was a desert; now it was producing cotton and several kinds of vegetables and corn, and was populated by a desert tribe of Arabs, who soon surrounded the illustrious strangers. M. Caillet here reigned supreme, and I had the pleasure to find he was my companion above alluded to, as he kindly joined our party at Tússún; and, as travellers will do sometimes, we there fraternised, and rode off together at once. Our attention was soon arrested by four fine-looking girls, who, *presque nue*, stood forward in the crowd. Our lady uttered an exclamation of astonishment; but familiarity levels even feelings of propriety, and our *honte* gave way to curiosity, particularly when we heard they were a band of Alméh women—the Egyptian *danseuses* who wander from place to place, votaries of Venus and the dance; and, as such, are unmolested. Their dance consists in their moving without walking, the soles of their feet being sculled along the ground without being raised once off it; at other times their feet being hesitatingly jerked along, as if tied together: they move perfectly upright, shaking their backs from the hips down by some extraordinary power of the spine—rather an indecent motion—and keep time by snapping their fingers to the sound of the tambourines. Their wriggling of those parts, as the music quickens, is something wonderful. Horace, it is supposed, refers to this kind of dance in the following line:—

“*Lesbium servate pedem, meique pollicis ictum;*”

so that this is most likely a very ancient mode of dancing.



London Published March 1st 1866 by Day & Son Limited Lithog^{rs} Gate Str. Lin. olus Inn Fields

Levy & Son Limited, Ltd.

ALMEH, OR DANCING WOMEN AT SERAPIUM.

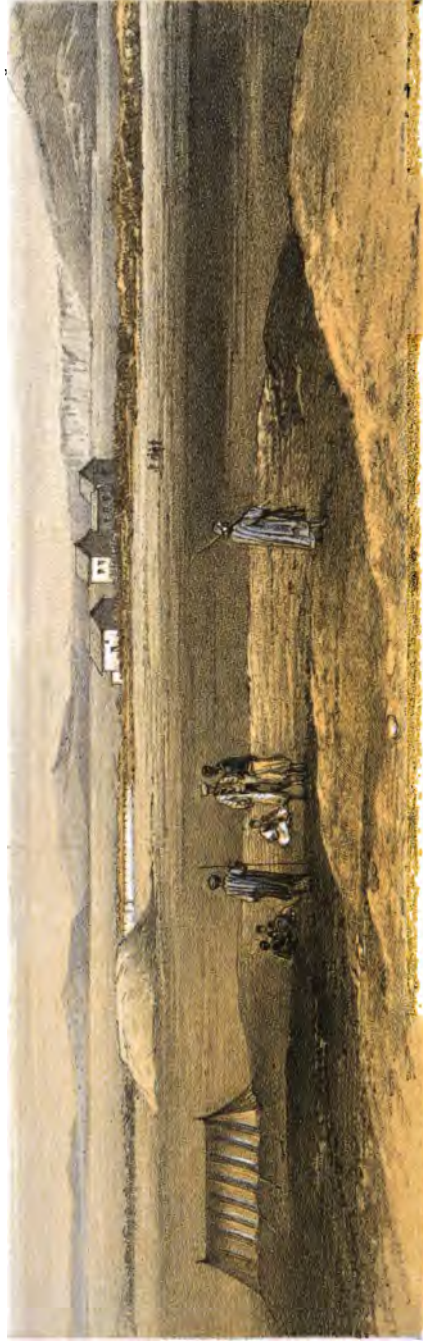
They were, though of a copper colour, handsome and well made, and some extremely young. By giving them presents, they took up an attitude at the entrance to M. Caillet's *châlet*, enabling us to sketch them. Their head-dress was rather elaborate, in which the folds of the turban and kerchief were entwined; a mere band of the brightest colours formed the jacket supporting the bosom, and a many-coloured loose trowsers hung low on the hips, and represented their entire wardrobe. As my pencil ran over the paper I perceived myself equally an object of attraction to this half-naked savage horde. Squalid children and bearded men gathered round me, so as almost to prevent my sketching, and the scene was altogether extremely original.

A delightful *déjeûné*, and a chat over what the keen observation of each brought on the tapis, graced by the charming manners and delicate wit of our agreeable Paï-sienne, wiled away the hours of noon; and, delighted with our day's journey, we rode back towards Ismalia: which place, after floundering in the dark on the borders of Lake Timseh, we only reached at 7.30, consequent on our having galloped away from our syces and guides, who were on foot; and were saved from the great danger of falling into pits, swamps, and quicksands, in which the lake abounds, by a camelleer, who was sent purposely to find us. Seeing us approach he made his camel kneel, and when we came up, as silent and characteristic as his beast he rose, mounted, and preceded us in the right path without uttering a word; and we knew, to our great satisfaction, we had only to follow him.

At 8.20 A.M., on the 18th, we again took to our boats, and were tracked up the sweet-water canal towards Zagazik, and in fifteen minutes reached the bridge and the demi-lock which drains and regulates the water as it enters the lower canal of the branch to Suez. This wooden bridge has

already been described. The fall of water was about two feet, and yet the plain of Bir-abu-Ballah, to which I alluded above, was below even this level of the Canal, and confirmed our conclusions of yesterday as to its being formerly flooded by the Nile. We reached the latter place after two hours' continued tracking from Ismalia down the Suez Canal.

At various epochs in the history of Egypt, its Pharaohs and conquerors, led by the desire of extending its fertility, or facilitating its commerce with the Red Sea, and consequently with the Arabian India of that day, had introduced the waters of the Nile by vast canals into this plain ; but all the enterprises of bygone days can, however, only be referred to as attempts to connect the Nile and the Red Sea, not—as at the present day—to connect the two oceans by a maritime canal. A perusal of M. Lepère's scheme to effect the latter object, published in 1808, and M. Pauline Talabot's in 1847, will repay the curious. The latter scheme being, in its results, more beneficial to Europe than Egypt, the French have invited all nations, as a *compagnie universelle*, to add that attempt to the enterprises of their predecessors ; and so far they have achieved the object of the latter, for Suez is now blessed with an abundance of fresh water : and it is estimated that the present Canal can supply fully 800,000 cubic mètres daily, and irrigate 50,000 hectares of land, which in this plain can thus easily be brought under cultivation. My French friends dwelt with great enthusiasm on this fact, and pointed to the long line of trees and cultivation on the plains below, which rendered Bir-abu-Ballah a delightful retreat. I was assured, that when the Bedouin tribe of El-Arsh saw their deserts turned into a garden they became fellahs, and, laying aside plunder and the spear, took to the plough. All this alarmed the Egyptian Government, who saw a large territory falling into the hands of a Company having its head office at



London, Published March 1st 1866 by Day & Son, Limited Lithogrs. Gave Sir Lincolns Inn, Fields.

Day & Son, Limited, Ltd.

B I R - A B U - B A L L A H .

Paris, and led to the settlement and indemnity of about 3,360,000*l.* sterling awarded by the Emperor Napoleon, so that the produce of the land should be the property of the State.

Leaving Bir-abu-Ballah, we arrived in half-an-hour at the branch canal, which led off from here and watered the plain at Serapium. It was now noon, and a nice northerly wind, which constantly blows from that direction at this time of the year, having sprung up, our boats proceeded gallantly along at a good pace, passing rapidly the telegraph poles, and the white posts which mark every kilomètre of the Canal, which is, in length, 84 to Suez from Ismalia, and about 10 mètres longer than the maritime, which takes a more point-blank direction. At intervals of four or five miles guard-houses are erected, for protection and shelter.

All the afternoon we were keeping the highest part of the plain approaching Suez, and having the pretty range of the Geneffe mountains on our right front, while the plain sloped away on our left into the vast deep valley, or basin, of the Bitter Lakes, marked by long lines of salt and wild brake, or thorn. It is 10 mètres below the level of the sea, and 15 mètres, or nearly 50 feet, below the level of our Canal. They are quite dry, and divided into two basins, 25 miles long. The bottom consists of yielding sand, impregnated with salt. To the right and left a horizontal ridge marks the ancient surf-line of the waters. Shells, of which there have been no trace since Suez, reappear in large quantities; small rhomboidal crystals of sulphate of lime are found scattered over the bottoms of the lakes. The deepest part of the larger lake is filled with a thick bed of sea salt. These masses of salt are sometimes superposed on deposits of alluvial sediment, probably from the Nile, or produced by the action of subterranean springs. The name is very ancient, as Pliny calls them the Bitter Lakes.

At 52 kilomètres, or about 33 miles, from Ismalia, we came to a rail or tramway from the quarries on the Geneffe range, to which this is our nearest point. Here a fine kind of plaster is found, and limestone for the sluices and works is procured. The above mountains are about a mile off, and a house on the brow was pointed out as having been occupied by the great Napoleon. The plain presents to the eye a perfect level to their very base, from which they rise perpendicularly to a height of about 1000 feet. We did not remain here; as, with the exception of trains of trucks descending towards the Canal, and a few human beings wandering like solitary beasts of prey over the desert plain, there was nothing to be seen; so we proceeded to the Pic-au-soixante, or 60th kilomètre.

Here we came to the first lock since leaving the entrance of the Canal, similar in every respect to the one already described. At this place the fall of water was about $2\frac{1}{2}$ feet. There were rows of uninhabited sheds and a tent already pitched, and here it was arranged we should sleep. We dined as we best could; and though every care was taken to make the lady of our party comfortable, yet she had to rough it, owing to our arrival not being anticipated. As for myself, I lay outside on one of those date bedsteads, and close by, lay my friend Abu Ghunnum, who told me a portion of his history. A true Ishmaelite, his original business was trading between Damascus and Gaza, and now he was the chief of the camelleers in the Company's employ, and procured their camels yearly from his brethren on the deserts of Damascus. His mode of interrupting the discourse was very characteristic of his nation and religion. Instead of using equivalents to excuse me—"Permettez moi, vous dire"—or listen, he always exclaimed, "*Sulli al Nebi*"—Pray to the Prophet; and if he differed, it was by the expression that "God alone is great," and so on. Religion is



London: Published March 1st 1868 by Day & Son, Limited Lithog^{rs} Gate Str. Lincoln's Inn Fields

Day & Son, Limited, Lith

THE SWEET - WATER CANAL AT THE HEAD OF LAKE AMEER.

a subject generally avoided when talking to Mahomedans, and very rightly so ; but there was something in that lovely evening, under that brilliant canopy of stars, which drew us into a conversation on a subject which, however, is common to all. Besides, the very land we stood on and the affability of my Ishmaelite friend favoured such a topic, so that we were imperceptibly led into a philosophic dissertation on the faith and relation of man to his Creator ; he appeared particularly interested at the following quotation from one of their own poets,* which I repeat here, as elucidating their faith and opinion on the subject :—

الانناكلنا بآيد واي بني آدم خالد وبدوهم كان من ربهم وكل الى ربهم عايد
فبا عجبنا كيف يعصى الله ام كيف يجحد العباد وفي كل شئ له آيت
تدل على انه واحد

We all are truly fading.	How can he God withstand,
What son of Adam rests?	Or disavow His Throne,
At first from God proceeding,	When all creation's hand
To Him return he must.	Points to Him — God alone ?

Which also indicated the necessity of a Source of Peace with Him.

The French Doctor afterwards joined our discussion, and, significant of the carelessness of his nation in matters of religion, declared that “ *la polythéisme est la religion perfectionné.* ” “ *La dévotion cruellement malplacé,* ” thought I.

The Arab rose—stood erect—raised his eyes towards heaven in the direction of Mecca. He then unbuckled his sword, and placed it across his feet on the little mat or carpet which he had spread before him. He then raised his hands to his head, stroked his long beard, repeated a few assertions on the power and greatness of God, and knelt down to his more meditative devotions.

We now caught such snatches of sleep as time permitted

* Abu El Ataheyâ, a poet of Cufa. See Aghanee.

until 5.30 A.M., when M. le Maître de Cérémonie, le Docteur, shaking his jovial sides *au pantalon*, enjoined the necessity of our departure.

As morning rose over Horeb and the wilderness of Etham we found we had turned the Geneffé range, and the more lofty and magnificent range of the Gebel Akaba to the south opened to our view. The western shore of the Red Sea washes its base, from which it rises in bold, perpendicular cliffs, to its very summit, which, beetling over that warm-looking ocean, marks the line of its western and lofty iron-bound coast; its eastern shore (excepting Ain Musa and a few date-trees) is a succession of deserts and arid mountains, on which the descending lights and shadows, clearly defined in such an atmosphere, presented a scene of vast extent and solemnity. The yearly route of the caravans of pilgrims from Egypt to Mecca is along this route. How is it that some wonderful influence has associated these deserts with the religious history of the world? The children of Israel, marching from Rameses, Succoth (Bir-abu-Ballah), and Etham, once encamped here; for of no other place could Pharaoh appropriately say "the wilderness had shut them in." Here, commanded by the Almighty, *they turned*, and instead of being entangled in the land among canals and fortresses, they retraced their steps, and crossed the vast lagunes of these salt lakes, termed generally, in all Oriental languages, "seas," and marched in three days to Marah, called at this present day Ain Musa, four hours from Suez. A fountain of sweet water and a few palm-trees are there still to be seen. Or can it be that "the place was called Marah," had reference to the Bitter Lakes of the present day? Moreover, by some volcanic agency, the "earth" alluded to in Moses' song, as swallowing them, may have sunk after the Israelites had passed, as we now find the valley of those salt lakes far below the level of the sea at Suez, and may have risen where





London Published March 1st 1866 by Day & Son, Limited Lithog^{rs} Gate Str. Lincolns Inn Fields.

Day & Son, Limited, Ltd.

THE MOUNTAIN OF GENEFFE, FROM CANAL.

we now stand, so that the lakes became severed from it. Had they crossed where it is generally supposed they did, they could not have turned, and the three-days' march to Ain Musa cannot be accounted for. The Red Sea, at one time, evidently extended to Lake Timsah, but by some volcanic agency, as above mentioned, the land was raised between Lake Ameer and the Red Sea, as the Scientific Commission found in the former shells of that sea, which do not exist in the Mediterranean.

In the centre of this vast arena I gazed with pleasure on that steep mountainous coast; the plain to the sea intersected by canals, and the yellow sand and rocky mountains of the desert, shutting all in, far to the eastward. And I hope the reader will excuse the expressions of these few thoughts, which the geographical features and associations of the country, from Rameses to the well of Moses, could not fail to suggest. In an hour and a half we were entering the Pharaonic Canal, whose bed the Company have utilized by leading theirs through it, and which has consequently assumed a width of some sixty yards, and more gigantic proportions; and in a few minutes we reached a place of debarkation and some rows of well-made huts, called Shalufat-el-Arba.

From this place we walked to the Maritime Canal, about a quarter of a mile to the eastward, which was cut through a clay soil; and here, for the first time, bowlders were to be seen, and a small bank of limestone, extending for a few hundred yards, was discovered. The Canal was four mètres (13 feet) deep, and nearly low enough to be flooded most effectually from the Sweetwater Canal, which I believe is the intention, in order to float the dredging-machines; which is far better, where soft clay and small stones are concerned, than the present system of manual labour. It was cut in full width, as far as we could see, towards Suez. This was the highest part of the Isthmus between the Bitter Lakes

and the sea, a distance of only 20 kilomètres, or 12 miles ; and shafts sunk close together in the bed of the Canal made known no other ridges of rocks, or any physical difficulty in sinking it to its required depth, until they came to the lagunes of the shore of the Red Sea, where banks of rock were discovered, but easily avoided by changing a little to the westward, the original direction of the Canal. We reached Suez at 10:30, on 19th November, 1864.

It is related by the ancient historians that the Pharaohs and other rulers in Egypt desisted from the canals to the Red Sea, as they had supposed that sea was above the level of the Nile Delta and Mediterranean, and, consequently, feared lest it might flood the country. But, as I have shown, the Nile water descends from Ismalia all the way to Suez ; and after much difference of opinion, even in our own days, it has at last been ascertained, after an accurate and scientific series of levels, that the difference between the levels of both seas is for all practical purposes nothing, and not half a mètre.

The low land contiguous to, and covered by the sea on the Suez shore of the Isthmus, is hard, and well adapted for harbour purposes : it consists of an impenetrable, bluish, pebbly mud, and we found that they scarcely required a pump to keep the water out of a large dry graving-dock which the Egyptian Government are excavating—in one of the island shoals about two miles from the shore at Suez, and half a mile from the present anchorage—though they had descended to a depth of 20 feet below the level of the sea.

From the above it will be seen that the French, departing from Gassaseen, have, following in the track of the ancients, made a sweetwater canal to Suez ; they have established a colony at Ismalia, and led the water of the Nile in pipes and tanks all the way to Port Saïd. They have built encampments and established little colonies along the line at

every fifteen miles or so, presided over by young French chasseurs and engineers (ready-made pioneers, if the French intend to take Egypt), and which render the organisation complete: they have also material, drags, barges, and workshops, in abundance, on which they have—

Expended, to June last	£1,200,000
They have paid for the domain Wadee	80,000
On excavations to date, about	1,720,000
Preliminary expenses, interest, expenses of administration	1,600,000
	<hr/>
	£4,600,000

They had on hand at that date, owing to the indemnity from the Viceroy, the accumulated interest on paid-up capital, net produce from the domain Wadee, and other sources, about 7,200,000*l.*, or nearly the whole of the share capital subscribed for, of which 1,600,000*l.* had not been called up.

The work to be done is now easily divisible into three heads:—1st. The completion of the section above the sea-level at El Guirz, at the plateau of Serapium, and at that between the Bitter Lakes and Suez, which is about half finished. 2nd. The deepening the Canal in its whole length (through Lake Timsah and Bitter Lakes excepted), from which, at 58 mètres wide and 8 mètres depth, some 60,000,000 of cubic mètres of sand and stuff have to be removed; and in this part of the work I pointed out the difficulty in the way at Lake Menzaleh. 3rd. The ports at the Mediterranean and Suez, and the buildings of locks and sluices, and embankments and quays, in Lake Timsah and the Bitter Lakes, which will become, as they once have been, small seas, when the ocean is again admitted.

And now my curiosity has been satisfied, my business has been accomplished, and my steps must turn homewards. I have admired much, and enjoyed much, during my short Egyptian ramble. I have admired the scientific skill and

undaunted energy with which the most stupendous work of modern ages is persevered with, in the face of difficulties sufficient to appal minds of more than ordinary calibre. I have gazed with pleasure, not unmingled with awe, on scenes richly fraught with the most solemn historic associations; and I have at the same time experienced and enjoyed an unpretending, though abundant hospitality, accorded with that peculiar grace and courtliness of manner which stamped it as genuine, and rendered its acceptance so charming; its acknowledgment is now the only return I can make on bidding adieu to my hospitable and kind companions, for at Suez the visit terminated, and each was again obliged to have recourse in search of amusement, or new objects of interest, to his own plans and resources—a change often fraught with some degree of regret. As we entered the hotel, and once more stood on that common platform, we found that the train of overland passengers had just arrived, and the courtyard was full of pretty English girls, seated in little groups on garden-chairs, reading with eager avidity their letters, containing the latest news from home. Young officers and others of our best classes moved gracefully about, and characteristically attended to their wants. We stood gazing on this novel scene: many a handkerchief passed hastily to the eye betrayed the depth of that affection and feeling for those from whom they had but lately parted. “*Voilà vos jolies filles anglaises*, your fair compatriots,” said my companion, in half French and English. “You may be justly proud of your dominion, for here you are *chez vous*.” I bowed with feelings of pride, not unmingled with sadness, and now recall, on closing my narrative, this scene so interesting, so connected with the subject we are upon, and so familiar to most of my readers.

LONDON:

Printed by DAY AND SON, LIMITED, Gate Street, Lincoln's Inn Fields.



